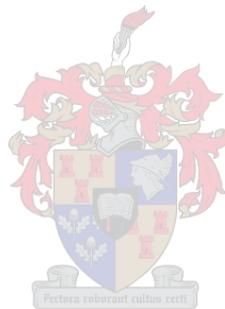


**ADOLESCENTS' EXPERIENCES OF DRUMMING AS AN ACTIVITY TO SUPPORT THEIR  
LEARNING**

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Educational Psychology at Stellenbosch University**

Supervisor: Ms M Perold

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**While science may lead you towards truth, only the imagination can lead you to meaning**

C.S. Lewis

## DECLARATION

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## **ABSTRACT**

In young people who struggle with stress-related experiences that accompany academic evaluations and performance, reproducing music, for instance through drumming, can play a role in experiences of success, and thus contribute to a sense of self-efficacy. The stronger the perceived sense of self-efficacy, the higher the goal challenges individuals set for themselves, and the firmer their commitment to these. The aim of the research was to investigate the potential of djembe drumming to function as a learning support strategy, in the lives of adolescents. In order to do this research, the researcher made use of a qualitative research design that was embedded within the interpretive paradigm. A grade nine class was informed of the research, and invited to volunteer. Fourteen participants volunteered to participate in the study. The participants in this study were adolescents between the ages of 15 and 17 years, and mixed in terms of gender and ethnicity. The primary method of data collection was observations and an inductive process of qualitative thematic analysis was used to analyse the data. The results revealed positive responses in terms of adolescents' experiences of drumming as a facilitator of learning support. The study revealed that participants demonstrated a comprehension of their own learning processes. Their experiences further illustrated their own awareness of having to concentrate and focus in order to participate successfully in the drumming group. Participants linked the drumming activity, to self-developed learning strategies, which they started implementing, such as studying with rhythm, and strengthening their memorizing abilities by connecting facts together in a story-form. These strategies imply the development of meta-cognition in the participants. The findings of this study can be used effectively in developing a therapeutic tool for inclusion in schools. Similar drumming programmes can be of a high value in the South African Education system, where serious imbalances in educational levels necessitate a need for tools that can be used in promoting and encouraging an inclusive education system.

## OPSOMMING

In jongmense wat probleme ondervind met angs verwante ervarings, wat verband hou met akademiese evaluering en prestasie, kan musikale ervaringe, byvoorbeeld deelname aan dromgroepe, 'n rol speel in die ervaring van sukses, en verder bydra tot die ontwikkeling van 'n selfwaarde ook genoem self-werksaamheid, verbind aan 'n oortuiging in eie akademiese prestasie. Hoe sterker die oortuiging in eie akademiese prestasie vermoë is, hoe hoër is die mikpunte wat individue aan hulleself stel, en hoe sterker is hulle onderneming aan hierdie mikpunte. Die doel van hierdie navorsing was om die potensiaal van djembe dromgroepe as 'n leerondersteuningsstrategie, te ondersoek in die lewens van adolessente. Hierdie navorsing het gebruik gemaak van 'n kwalitatiewe ondersoekmetodologie, vasgelê binne 'n interpretatiewe paradigma. 'n Graad nege klas is ingelig oor die navorsing, en uitgenooi om daaraan deel te neem. Veertien deelnemers het vrywillig aangebied om aan die navorsing deel te neem. Die deelnemers in hierdie studie was adolessente tussen 15 en 17 jaar, en gevarieerd met betrekking tot geslag en etnisiteit. Die primêre metode van data insameling was observasies, en 'n induktiewe proses van kwalitatiewe tematiese analise was gebruik om die data te analiseer. Die resultate het 'n positiewe uitslag aangedui ten opsigte van deelnemers se ondervindinge van dromgroepe as 'n fasilitering van leerondersteuning. Die studie het aangedui dat deelnemers 'n insig in hul eie leerproses gedemonstreer het. Hulle belewenisse het verder aangetoon dat daar 'n gewaarwording ontstaan het dat konsentrasie en fokus sentraal gestaan het tot suksesvolle deelname aan die dromgroep. Deelnemers het die dromaktiwiteit gekoppel aan self-ontwikkelde leerstrategieë; wat hulle begin toepas het. Voorbeelde hiervan is, om met 'n ritme te studeer, en om hulle memoriseringsvaardighede te versterk deur feite aanmekaar te heg, in 'n verhaal. Hierdie strategieë impliseer die ontwikkeling van meta-kognitiewe vaardighede in die deelnemers. Die bevindinge van hierdie studie kan suksesvol bydra tot die ontwikkeling van 'n terapeutiese instrument vir inklusiwiteit wat in skole aangewend kan word. Soortgelyke dromgroep programme kan van hoë waarde in die Suid-Afrikaanse onderwysstelsel wees, waar ernstige ongelykhede ten opsigte van onderwysvlakke 'n ernstige behoefte skep vir instrumente wat gebruik kan word in die bevordering en ontwikkeling van 'n inklusiewe onderwysstelsel.

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## CHAPTER 1: CONTEXT AND RATIONALE OF THE STUDY

### INTRODUCTION

The researcher's primary occupation for the past 21 years, has been as a music teacher. Throughout the teaching of music to young children and adolescents, she has witnessed the profound effect that music can have on the various levels of developmental functioning of young people. She became very aware how music can influence the lives of adolescents academically, socially and emotionally. Bandura (1977) theorised about the role of constructs like self-esteem and self-efficacy in a person or adolescent's said academic, social and emotional functioning. It thus seemed useful to explore the links between the socio-cognitive theory, musical influences and adolescents' functioning in school environments.

Teachers, educationists, social scientists, and parents are increasingly becoming concerned about matters related to academic stress, examination anxiety, and the possible effect of this on an adolescents' learning processes, well-being, and mental health. A sense of self-efficacy and self-esteem represent motivational forces (Woolfolk, 2010) that affect perceptions and coping behaviour, they buffer stress by mitigating the perceived threat and by enhancing the selection and implementation of efficacious coping strategies. Perceived self-efficacy refers to beliefs in one's capabilities to organize and execute the courses of action required to produce given attainments. Bandura (1977) defines the concept of self-efficacy as the most central belief in personal efficacy and points out that efficacy belief is therefore a major basis of action. Green (2008) has shown that self-efficacy is a powerful predictor of academic performance, thus, students with higher academic self-efficacy achieve higher academic performance, set higher goals for themselves, and show greater effort and persistence in their work. Zimmerman (2000) reports that students bring their own experiences and level of generalized self-efficacious behaviour with them, and these beliefs influence such academic behaviours as the choice of activity, level of effort, persistence, emotional reactions and career choices.

It thus becomes the prime duty of social scientists, in particular psychologists, to identify ways of developing self-efficacy and self-esteem in order to enhance adolescents' learning processes. The present investigation was undertaken to examine the working

modality of drumming as a form of music therapy, and as an intervention to increase a sense of self-efficacy and self-esteem in adolescents and improve learning at school.

In music therapy, musical experiences, as well as the therapeutic relationship developing through them, are used as dynamic forces, producing therapeutic change (Bruscia, 1998). Music therapy techniques are applied within a systematic process between client and therapist, hereby fostering relational musical experiences that deepen the therapeutic relationship and which might contribute to an increase in therapy motivation (Mössler, Assmus, Heldal, Fuchs & Gold, 2012). Music therapy techniques can be understood as working modes offering different musical and relational experiences. The techniques work together with psychotherapeutic techniques (e.g. mirroring, holding, confronting) within the specific use of musical parameters (e.g. rhythm, sound, tonality) (Wigram, 2004).

Music therapy techniques can be assigned to the following categories, production techniques, reproduction techniques and reception techniques. Production techniques focus on emotional expression and the conceptualisation of the relationship, between client and therapist, through musical improvisation (e.g. structured, thematic, communicative, trying out, free improvisation), where client and therapist create something musically new. Reproduction techniques involve client and therapist playing or singing pre-composed pieces of music, as well as learning or practising musical skills (e.g. guitar chords, set rhythm techniques on a drum). These may provide a holding structure and framework in which the actualisation of memories can be supported and explored within the context of the relationship. Reception techniques involve the client listening to live or recorded music. These musical experiences may be used to focus on a conscious awareness of the client's current mental state and emerging associations (Tennant, 2002). Research into the mentioned techniques or working modalities seemed to indicate that reproducing music "...may foster the development of relational competencies in individuals with low motivation" (Mössler et al., 2012, p. 333). In young people who struggle with stress-related experiences that accompany academic evaluations and performance, reproducing music, for instance through drumming, might play a role in experiences of success, and thus contribute to a sense of self-efficacy. Therefore also motivation for musical support interventions within relationships, as well as motivation for academic work.

Neurologists have attributed functional characteristics to the two hemispheres of the brain: the left side is assigned to analytical, and the right to emotional functioning. The hemispheres are interconnected through the corpus callosum. It has been shown that music therapy activates biochemical and electrical memory material across the corpus callosum, thus enhancing the ability of the two hemispheres to work in unity, rather than in opposition (Updike, 1990). Music (which includes rhythm) can stimulate the production of endorphins, the body's natural opiates, as well as reduce the levels of cortisol and noradrenaline, hormones that are related to the experience stress (Watkins, 1997). This understanding of the effects of music therapy on a neurobiological level thus also underlies thoughts regarding the value of musical interventions as part of learning support activities.

### **1.1 BACKGROUND TO THE STUDY**

Throughout many years of investigation and enquiry, it has been shown that music enhances the learning power of children and adolescents (Ohman-Rodriguez, 2004). Gardner (1993) noted that musical intelligence is the first of multiple intelligences to emerge in young learners. Woodall and Zeimbroski (2013) noted that music played an important role in language and literacy development.

If an adolescent is unable to cope with academic stress, then there may be serious psychological, social and emotional health consequences (Tennant, 2002). Adolescents are constantly busy with studies and examinations, which may lead to experiences of heightened stress and anxiety, and are often ill-equipped to cope with stress associated with transitions from childhood to preadolescence, and from preadolescence to adolescent phases (Dacey, 1979).

### **1.2 PROBLEM STATEMENT**

The problem statement describes the context for the study (Wiersma & Jurs, 2009). The intention is to identify what knowledge exists about the topic, what obvious gap there is in the existing knowledge, on which aspect of the knowledge the gap focuses, why it is important to have this additional, new knowledge, and lastly, the specific purpose of the study (Merriam, 2009). The aim of this section is therefore to identify the relevant gap in knowledge regarding drumming as a form of learning support for adolescents. Although

much research has been done regarding the influence of music on emotional states, as well as on neurological functioning of the brain, there seems to be a paucity in literature regarding the influence of musical activities, such as drumming, in promoting an effective learning process in adolescents.

### **1.3 GOALS AND OBJECTIVES**

The purpose of this study is to increase knowledge about the way in which drumming can be used or applied as a learning support strategy in the lives of adolescents. The research question that guided this study therefore is:

*How does djembe drumming facilitate learning?*

In an attempt to gain further insight into the perceptions and experiences of drumming as learning support for adolescents, the following secondary research questions guided the study further:

- 1 What are the experiences of adolescents participating in a drumming group?
- 2 What specific experiences of participating adolescents can contribute to general improvement in their learning?
- 3 How do the participating adolescents link the drumming activity with learning?

### **1.4 RESEARCH DESIGN**

This study is undertaken from a bioecological perspective in an educational psychology context. There are many variants of the bioecological perspective across different contexts; however this perspective seemed an appropriate theoretical underpinning for this study, as the positive effects of improved self-esteem and self-efficacy can impact not only on the adolescents involved, but also on the entire community associated with the school.

A bioecological perspective is based on the principle that intrinsic and extrinsic factors from different systems in a specific social context influence one another in a dynamic and continuous process of balance, tension and interplay (Donald, Lazarus & Lolwana, 2002).

Central to the research process, is the research paradigm (Mouton, 2001). Terre Blanche, Durrheim and Painter (2006) describe paradigms as systems of interrelated ontological, epistemological and methodological assumptions, and these act as perspectives that provide a rationale for the research, and commit the researcher to particular methods of data collection, observation and interpretation. Ontology specifies the nature of reality that is to be studied, and what can be known about it. Epistemology specifies the nature of the relationship between the researcher and what can be known. Methodology specifies how the researcher practically studies whatever he or she believes can be known (Terre Blanche et al., 2006; Mertens, 2005; Merriam, 2009). This study will be conducted from an interpretivist paradigm.

A qualitative research design was used in this study, within the interpretivist/constructivist paradigm. Interpretivist theory operates from the stance that reality is socially constructed, and therefore there is no single, observable reality, but multiple realities (Merriam, 2009). Each individual's reality is thus influenced by the subjective experiences of the particular individual, and is therefore unique (Terre Blanche et al., 2006). Researchers using the interpretivist paradigm assume that people's subjective experiences are real (ontology), that we can understand others' experiences by interacting with them and listening to what they tell us (epistemology), and that qualitative research techniques are best suited to this task (methodology) (Terre Blanche et al., 2006). A qualitative research design resonates with the study's paradigm, as well as with the methods of data collection. Furthermore, it is suited to the aims of the study, which are to explore the experiences of adolescents of group drumming as a learning support activity. Qualitative methodology embraces the uniqueness of each adolescents' experience, and allows participants the freedom to express their experiences.

The research was guided by a case study design, consistent with a basic qualitative inquiry framework (Merriam, 1998). Commonly associated with educational research, case study research is often used in the study of applied practices. Case study research involves in-depth exploration within a single unit or a bounded system and has flexibility with regard to the methods of participant selection, data collection, analyses, and representation used (Merriam, 1998). The researcher familiarised herself with the participants' reality by exploring the experiences of the group of adolescents who took part in a drumming group.

The study therefore focused on the subjective experiences of research participants, and the researcher adopted an interactional stance towards the participants by means of interviewing, observing and scanning documents as data collection methods.

## **1.5 RESEARCH METHODOLOGY**

### **1.5.1 Selection of participants**

Sampling refers to the action undertaken by the researcher to identify a population of interest, or a unit of analysis, which then becomes the focus of the study (Durrheim & Painter 2006). The participants for this study were identified through purposeful and voluntary sampling.

A group of learners in one grade (namely Grade 9) was invited to volunteer to take part in the study. A Grade 9 class (on a random basis) in the particular school was approached as the unit of analysis for the case study, and the learners were asked to volunteer to participate after the process had been explained to them. The participants in this study were therefore adolescents between the ages of 15 and 17. The researcher decided to focus on this age group, as it has been shown that the self-esteem of adolescents develops positively or negatively at this age (Bandura, 1986). It was hoped that an intervention such as the proposed study, may have a pronounced effect on the self-esteem and self-efficacy of adolescents. Further, sensorimotor abilities, such as perceptual and motor skills, improve throughout childhood, peak in young adulthood, and decline thereafter (Bloch, 1998, Dempster, 1992). These abilities would benefit the adolescent in drumming activities.

There were 15 drums available, and 14 adolescents took part in the research study.

### **1.5.2 Data collection**

Interpretive researchers attempt to become a natural part of the context in which the phenomenon being studied transpires. This can be attained by entering the research setting with the necessary care, and engaging with research participants in an open and empathetic manner (Terre Blanche et al., 2006).

The primary method of data collection was observation during eight drumming sessions that were conducted by the researcher. Observations took place while the phenomenon being studied occurred, and this brought the researcher closer to the phenomenon itself (Terre Blanche et al., 2006). The observations took place at a secondary school in a semi-rural area while the drumming sessions were conducted. The drumming sessions were captured by way of video recordings. As the researcher actively took part in the drumming sessions herself, the video recordings served as a method of observation.

The secondary data collection method for this study took the form of semi-structured interviews. Patton (2002) states that one of the main aims of the interview in qualitative research is to gain insight into the interviewee's world. The interview itself can be viewed as a narrative in which both the interviewer and the interviewee construct a story that is situated within a particular context (Fontana & Frey, 2005). For the purposes of the present study, a focus group interview was conducted with the participants after the drumming sessions had been concluded.

During the drumming sessions, the researcher attempted to elicit feedback from the participants, as they were taking part in the activity, to label their experiences in terms of favourite songs or creative body movements. The aim was to achieve data collection triangulation (Maxwell, 2005).

### **1.5.3 Data analysis**

Terre Blanche et al. (2006) point out that an analysis of the data aims at arriving an explanation, understanding or interpretation of the participants' experiences. A crucial principle of interpretive analysis is to stay close to the data and to interpret information from a position of empathic understanding. Through immersion in the data, the researcher becomes thoroughly familiar with the phenomenon at hand, in the process reflecting on it prudently, and subsequently being able to write an insightful interpretation (Terre Blanche et al., 2006). It would therefore be important for the researcher to remain aware of his or her own position with regard to the phenomena explored, as bias may tend to creep into interpretation. For this reason a research journal (Addendum P) was kept for the present

study in which the researcher reflected on the process followed, as well as on own experiences and the possible effect thereof on the interpretation of data.

The interview transcripts were analysed by the adolescents, as were the field notes and descriptions (favourite songs or movements). An inductive approach was followed in an attempt to identify patterns in the data by means of thematic codes (Patton, 2002). The process of inductive analysis implies that patterns, themes and sub-themes of analysis come from the data. According to Patton (2002), patterns and themes should emerge from the data, rather than be imposed prior to data collection and analysis. In the present study, the process was directed through data reduction, as well as through arrangement and display of data, in an effort to distinguish patterns and themes in the data (Maxwell, 2005). Conclusions were drawn from the meaning which emerged from the data, the implications were assessed, and the data was verified by revisiting it and cross-checking for themes and patterns. This study thus focused on qualitative content analysis (Patton, 2002). Coding was used to combine themes and sub-themes in order to interpret the data, and the coding was analysed using the constant comparative method (Bowen, 2005), concluding with a comparison between the themes that emerged and the literature that was explored.

#### **1.5.4 Role and limitations of the researcher**

The researcher was an active participant in the drumming sessions. The researcher was therefore the “human instrument” for gathering and analysing data, as well as for producing meaningful information, and was “limited by being human and thus fallible as any other research instrument” (Merriam, 1998, pp. 75). Priority was given to the qualitative methodology. Patton (2002) states that the credibility of qualitative research hinges to a large extent on the skill, competence and rigour of the investigator. Qualitative researchers also have the advantage of personal contact with people and the situation under study. However, critics of qualitative inquiry are, for this very reason, concerned with the subjective nature of the approach. In an attempt to enhance the credibility of the present research, the strategies used in this study did not “advocate biased distortion of data to serve the researcher’s vested interest and prejudices” (Patton, 2002, p. 101). It was deemed essential that honest, meaningful, credible and empirically supported findings were produced by the qualitative approach used to conduct this research.

## **1.6 ETHICAL CONSIDERATIONS**

Ethical guidelines in research are needed to guard against possible harmful effects of research (Mertens, 2005). The researcher undertook to adhere to the ethical guidelines, as set out by the Ethics Committee (Addendum A). Permission to do the research was obtained from the Western Cape Department of Education (WCED) (Addendum B). Participants in the drumming sessions and focus groups were informed that they were under no obligation to take part in the research, and that although the researcher had the consent of the WCED participants were free to withdraw at any time, if they so wished. Participants were informed both verbally and in writing that the source of the data collected and their responses would be treated confidentially. However, they were made aware that their participation in the drumming activities might be known to other learners, staff of the school and members of the community. The participation was based on age and grade, but further random and voluntary. No risk was anticipated in the participation with drumming activities as such.

Permission to conduct the research in this secondary school situated in a semi-rural area was obtained from the headmaster of the school. (Addendum C)

## **1.7 TERMINOLOGY**

### **1.7.1 Adolescence**

Social scientists divide adolescence into three stages: (a) early adolescence (10–13 years old), (b) middle adolescence (14–17 years old), and (c) late adolescence (18–21 years old) (Steinberg, 2008). For the purpose of this study, the period of adolescence ranges from the age of 11 to 19.

Adolescence is set apart from other periods of life because there are three fundamental transitions: (a) biological, (b) cognitive, and (c) social (Steinberg, 2008). It is however important to keep in mind that each adolescent's journey is unique owing to unique individual and environmental influences.

The changes in self-esteem, identity, cognition, and biological transition during adolescence frequently drive individuals to seek autonomy. Autonomy for adolescents also involves developing personally meaningful values and life goals (Berk, 2000).

### **1.7.2 Drumming**

The study of the social and personal uses of music and effects of music are evident in a number of related but diverse fields of enquiry. This form of study can be described as a study of the 'extra-musical' benefits of music, where the emphasis lies less within the study of music for its own sake, but more with music as a facilitator of social and personal development. Within the psychology of music field there is a discourse relating to the effect of music, playing and listening, on emotional and cognitive processes (Overy, 1998). The relationship between drumming in particular and personal and social health has been explored (Friedman, 2000). A continually growing body of literature relates to the instrumental use of music and percussion as access points to learning, as ways of enhancing professional management practice, and as experiences that help to enhance interpersonal effectiveness.

Mikenas (2003) is of the opinion that drumming at low frequency bypasses the brain's reticular activating system, thereby stimulating all areas of the brain at once. An advantage of a drumming group is the fact that a number of individuals may be affected simultaneously. While improvement occurs at individual level, a collective consciousness also develops during drumming.

### **1.7.3 Learning support**

Learning support refers to the role that educational support professionals (such as educational psychologists, school counsellors, therapists, special educators and learning support specialists) and mainstream teachers play in addressing the diverse needs of

learners (Engelbrecht, 2001). Booth (2000, pp. 121) defines learning support as “all activities that contribute to the capacity of a school to respond to diversity” of its learners. Support is thus provided in collaboration with the mainstream teacher and other role-players in and outside the school.

## **1.8 STRUCTURE OF THE THESIS**

Chapter 1 describes the background, and the process of exploring the experiences of adolescents in a drumming group. This chapter introduces the ways in which drumming can be used as learning support for adolescents. The aims of the study, scope of the study, research questions, ethical considerations and the research methodology are also provided in this chapter.

Chapter 2 will present the theoretical framework underlying the study, and a review of the literature on this topic. It explains the ways in which drumming can be used in supporting learning. Descriptions of other positive experiences adolescents have of drumming sessions will also be offered.

Chapter 3 presents the sampling method, the size of the sample and population of the study, the research method, data collection methods and data analysis procedures. Detail descriptions of the ethical considerations and the verification of the data and findings will also be presented.

Chapter 4 presents the results of the study as obtained from the data analysis.

In the final chapter, Chapter 5, a discussion of the findings regarding the experiences of adolescents using drumming as a learning support are presented. Implications of the findings of the study are also discussed, as well as their relevance to future studies. Finally conclusions are drawn and recommendations made.

## **1.9 CONCLUSION**

The aim of this chapter is to provide background to the study, in order to orient the reader regarding the research that was conducted. It further contextualises the research and motivates its relevance and importance. This chapter also provides a brief description of

the theoretical framework underlying the research, and also the research process implemented.

The next chapter provides a detailed overview of the literature relevant to gaining insight into the experiences of adolescence in the use of drumming as learning support. This includes a review of the main features of drumming and music as a therapy, and its impact on the lives of adolescents. Further, the literature review focuses on aspects including adolescence, academic achievement in adolescence, the role of self-esteem on academic achievement, and the way in which drumming can function as learning support.

## CHAPTER 2: LITERATURE REVIEW

### INTRODUCTION

The second chapter of this research investigation reviews the literature pertaining to adolescents' experiences of engaging in drumming activities, djembe drumming in particular. Babbie (2002) states that the basic purpose of a literature review is to give an overall, comprehensive appraisal of previous research on the topic considered for study, and in addition to point out where this research fits into the general body of scientific knowledge. Babbie (2002) further notes that the literature review also influences and directs the researcher's own study, as the researcher sets about finding gaps in the previous knowledge, in an attempt to build on the existing knowledge by focusing on factors that have not been deliberated on in detail.

The purpose of this study was to gain insight into whether participation in a djembe drum group could have an effect on self-esteem and a sense of self-efficacy of adolescents, and eventually also have a positive influence on their academic work. Research has shown that individuals with high levels of self-esteem are more able to cope with challenges and negative feedback, and that they usually live in a social environment in which they believe that people value and respect them (Heatherton & Wyland, 2002). Education policies have been tailored to instil high self-esteem in children, based on the belief that positive self-esteem is of cardinal importance to healthy development. Personal and environmental influences has been shown to have a positive effect on self-esteem, and further also on the individual's relationships and developmental outcomes. Research has revealed that high levels of self-esteem are associated with life satisfaction, happiness, healthy behavioural practices, perceived efficacy and academic success (Harter, 1987; Huebner, 1991; Lipschitz-Elhawi & Itzhaky, 2005; Rumberger, 1995; Swenson & Prelow, 2005; Yarcheski & Mahon, 1989). Moreover, there is evidence that high self-esteem acts as a protective factor for children at risk of adverse developmental outcomes (Dumont & Provost, 1999; Masten & Garmezy, 1992; Werner & Smith, 1992). Conversely, low levels of self-esteem have been linked to negative developmental outcomes such as depression, post-traumatic stress symptoms and anxiety, conduct problems and delinquency, academic difficulties, substance

use, and suicidal behaviours (Aunola, Stattin & Nurmi, 2000; Lengua, Long, Smith & Meltzoff, 2005; Lewinsohn, Rohde & Seeley, 1993; Pottebaum, Keith & Ehly, 1986). Longitudinal research has furthermore provided evidence that childhood self-esteem influences adult functioning (Werner & Smith, 1992).

In order to gain insight into the experiences of adolescents participating in a djembe drum group, this chapter presents the bioecological framework as a contextual approach to understanding the lived experiences of the participants, a conceptualisation of self-esteem and self-efficacy, the role this conceptualisation of self-esteem and self-efficacy plays during the adolescent phase, and the role of a djembe drum group as a support intervention specific to learning.

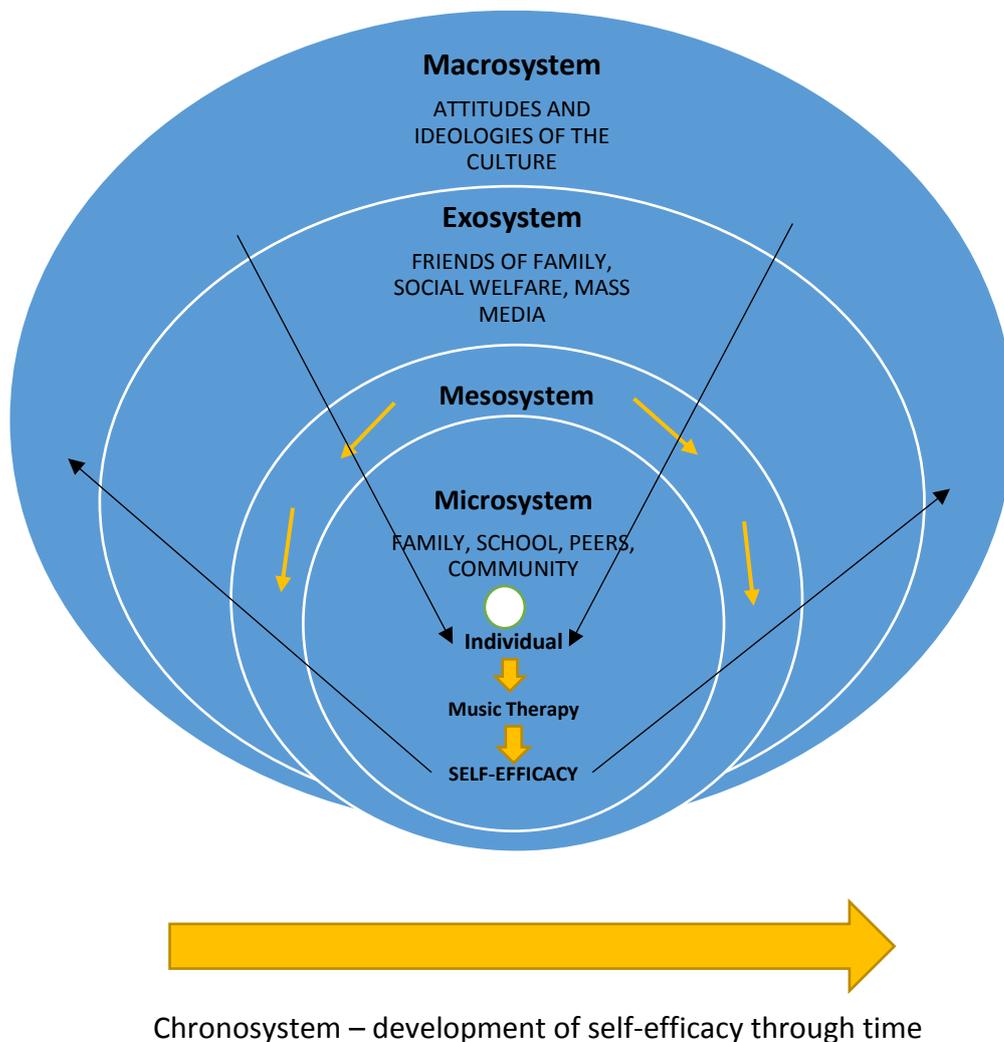
## **2.1 BIOECOLOGICAL THEORY: PROCESS – PERSON – CONTEXT – TIME**

In the Bioecological Model of Bronfenbrenner (1979), the individual is seen to be a system immersed in an ecological system consisting of multiple levels, all of which have an impact on the individual's development. The ecological environment is conceived "as a set of Russian dolls" (Bronfenbrenner, 1979). The model, like Bandura's Social Theory (Bandura, 1991), emphasises the importance of understanding the contexts in which learning takes place, as well as the dynamic interactions of these contexts with each other and the individual. Adolescents' perceptions of the systemic environment are central to their interaction with his systemic environment, and therefore it guides or influences their conduct towards other people as members of the systemic environment (Swart & Pettipher, 2011). In order to ensure optimal development, all participants in the respective systems should pursue effective patterns of interaction, called proximal processes, in the bioecological model.

In the theory, development is defined as "the person's evolving conception of the ecological environment and his relation to it, as well as the person's growing capacity to discover, sustain, or alter its properties" (Bronfenbrenner, 1979, p. 435). Bronfenbrenner was of the opinion that all levels of organisation involved in human life are linked integratively in the course of an individual ontogeny and that his theory needed to include

the levels of individual structure and function (biology, psychology, and behaviour) fused with the ecological systems (Bronfenbrenner, 1979).

For the purpose of this study, the microsystem refers to the individual and the influence of self-esteem and self-efficacy on learning and development in the individual. The mesosystem refers to the influence of music therapy on self-efficacy, and further on learning and development in the school. The improvement of self-efficacy due to the effects of music therapy may show an enhancement in learning, and reach further into other aspects of the adolescent's life, such as relationships, community participation, etc. The influence of self-efficacy on the adolescent's learning and development may only be visible in the exo- and macrosystem over time, thus in the chronosystem.



**Figure 2.1. An adapted version of the Bioecological Model of Bronfenbrenner (Bronfenbrenner, 1979)**

### **2.1.1 The microsystem**

The innermost level, the *microsystem*, is the immediate setting in which the adolescent experiences and creates day-to-day reality. This can be the home, classroom or any other immediate environment the adolescent finds him- or herself in. The microsystem is very small at first, involving interaction with one or two people at a time, engaging in simple activities such as feeding, cuddling and simple communication. As the child develops, interaction with more people takes place. This research study aims to investigate the possible effect of music therapy, in the form of djembe drumming, on the sense of self-efficacy of the adolescent, and eventual influence on learning.

Successes or mastery experiences have been shown to build a sense of self-efficacy, and repeated failures undermine it (Bandura, 1977; Woolfolk, 2010). The experience of music therapy aims to offer experiences of success, and therefore to strengthen participants' self-efficacy.

### **2.1.2 The mesosystem**

The *mesosystem* explores interaction beyond a single setting, at the level of relations between and among the different microsystems. It presents the connections between the structures of the adolescent's microsystems, and, in the case of this study, at the connection between the child's parents and the school. The mesosystem is measured by the number and quality of connections. Various findings indicate that the capacity of a dyad to serve as an effective context for human development is crucially dependent on the presence and participation of third parties. If such a third party is absent, or if it plays a detrimental, rather than a supportive role, the developmental process may come to a standstill (Bronfenbrenner, 1979). The current research investigation aims to offer another supportive relationship or interaction, in the form of a connection with music therapeutic activities, and thereby to strengthen and promote the developmental process.

### **2.1.3 The exosystem**

The *exosystem* includes the larger social system and refers to one or more settings from which various influences may affect the adolescent's development profoundly, even though the adolescent may not be present. The structures in this layer have an impact on the adolescent's development by interacting with structures in his or her microsystem, such as training of teachers or community-based resources. An adolescent's society is responsible for providing resources that enable structures of the adolescent's micro- and mesosystem to flourish, thus contributing positively to the adolescent's development (Paquette & Ryan, 2001).

### **2.1.4 The macrosystem**

The outermost level, the macrosystem, pertains to settings on all three levels and is composed of cultural values, customs and laws. Macrosystems are the blueprints for the ecology of human development. The blueprints reflect a people's shared assumptions about how things should be done (Bronfenbrenner, 1979). Societal values, policies, and financial resources that the society provides also create the context in which families function, affecting how learning takes place and ultimately how the adolescent develops. In the current research investigation, cognisance needs to be taken of these dynamics, because of the impact of macrosystemic factors on the adolescents in a high school in a previously disadvantaged area in the Western Cape province of South Africa. Owing to South Africa's divided history, different attitudes and especially ideologies may have impacted on the segment of society which the participants in this study represent. Such factors can have a direct impact on the overall development of adolescents (Paquette & Ryan, 2001).

### **2.1.5 The chronosystem**

The chronosystem involves changes, however big or small, which take place over time (Bronfenbrenner, 1979). These changes occur in the individual or in the environment, or within the interaction between the individual and the environment. Development takes place over time, and experiences from past, present and future influence it. The current research investigation aims to explore the experiences of participating adolescents in a

drumming group, and whether these experiences contribute to the general improvement of their learning. Thus the personal experiences of the adolescents over time will be explored.

Having described a model within which human development can be framed, it also seems appropriate to describe the specific phase of development in which the participants in the study find themselves. The adolescent phase will therefore be unpacked and discussed in the following section.

## **2.2 ADOLESCENCE**

### **2.2.1 Development of the concept of adolescence**

In the twentieth century, adolescence in the Western world was defined as a separate stage of life, whereas in many traditionally oriented cultures, the lifestages, in terms of childhood, young adult and mature adult, remained unchanged. An increasing trend towards globalisation has begun to change the experience of youth in many non-Western cultures (Cobb, 2007). In the field of psychology, adolescence is seen as the bridge between childhood and adulthood. David Cohen (as cited in Pinnock, 1997, p.7) describes adolescence as “a rope bridge of knotted symbols and magic between childhood and maturity, strung across an abyss of danger”.

Definitions and descriptions pertaining to adolescence vary widely according to cultural beliefs, and are not collective in nature (Umeh, 2009). In the Western culture adolescence is perceived as beginning in puberty, from the ages of 10 to 12, and ending when the individual reaches the ages of 18 to 19 years (Umeh, 2009). For the purpose of this study I departed from the Western definition and description of adolescence, as the group with which the research investigation was done was part of Western society.

Specific definitions of adolescence include biological, psychological, and sociological descriptions (Cobb, 2007). Biological and physical changes during puberty transform children into sexually and physically mature adults. Beginning in early adolescence, puberty takes two to four years to complete. Various growth processes are involved, each one regulated by different hormones and frequently occurring at different rates (Graber & Brooks-Gunn, 2003). The psychological changes that occur in adolescents include a

convergence of physical maturation with changing personal and social expectations. These changes confront the adolescent with new developmental tasks. Adolescence is thus viewed as a transition period, a time of change. The biological changes result in an expectation that the individual's behaviour will change, as well as the individual's view of self to change (Nash, Stoch, & Haroer, 1990). According to the mentioned authors, the biological changes of adolescence have important consequences for social and personal development.

Adolescence, viewed from a social perspective, is an important period of development during which the child acquires the social, emotional and personal skills and attitudes which will help him or her become an appropriately adjusted adult who can contribute to society in meaningful ways (Dacey, 1979). The major focus of adolescence, the 'Who am I?' question, is addressed by Erikson (1963) in his psychosocial theory, in which he offers an understanding of child and adolescent development.

### **2.2.2 Erikson's Psychosocial Theory**

The basic framework of Erik Erikson (1963) for understanding the development of young people is called the Psychosocial Theory. Erikson was not the only theorist to offer a theory of personal and social development; however, the researcher decided to make use of Erikson's approach, as this author emphasises the emergence of self and the search for identity, which relates to the first secondary research question, which investigates the individual experiences of the adolescent with regard to taking part in a djembe drumming group. Erikson determines that all human beings have the same basic needs, and each society must provide in some way for those needs. Emotional changes and their relation to the social environment follow similar patterns in every society. The emphasis on the relationship of culture and the individual, directed Erikson (1968) to the development of the psychosocial theory of development. Erikson described development as a passage through a series of stages, each one with its particular goals, concerns, accomplishments, and dangers. The stages are interdependent, and accomplishments at later stages depend on how conflicts are resolved in the earlier years. Erikson suggests that an individual faces a developmental crisis at each stage. Each of these crises involves a conflict between a

positive alternative and a potentially unhealthy alternative. The approach with which the individual solves the crisis will have a lasting effect on that person's self-image and view of society (Erikson, 1968).

Erikson's theory includes eight different stages, as set out in Table 2.1 below.

**Table 2.1.** Erikson's eight psychosocial stages (Adapted from Erikson, 1968)

<b>Psychosocial stage</b>	<b>Age</b>	<b>Challenge/Task</b>
Basic trust versus mistrust	Birth to one year	To develop a sense that the world is a safe and good place
Autonomy versus shame and doubt	1 to 3 years	To realise that one is an independent person who can make decisions
Initiative versus guilt	3 to 6 years	To develop a willingness to try new things and to handle failure
Industry versus inferiority	6 years to adolescence	To learn basic skills and to work with others
Identity versus identity confusion	Adolescence	To develop a lasting, integrated sense of self
Intimacy versus isolation	Young adulthood	To develop a lasting, integrated sense of self
Generativity versus stagnation	Middle adulthood	To contribute to younger people, through childrearing, childcare or other productive work
Integrity versus despair	Later life	To view one's life as satisfactory and worth living

Erikson departs from the premise that identity formation can be tracked throughout the various stages of development (1968).

For the purpose of this research investigation, the researcher will discuss an aspect of the adolescent phase, namely identity versus role confusion. A considerable amount of research has centered around this fifth stage, most notably by Marcia (1966). Marcia indicated that the influences of significant others in the identity formation process, and

intimate partnerships were characterised by a dual focus on the self and relationships (Beyers & Seiffge-Krenke, 2010).

The development of identity, which is a central issue for adolescents, provides a firm basis for adulthood. Identity refers to the individual's drives, abilities, beliefs, and history (Erikson, 1968). Erikson was of the opinion that the process of identity formation is central to the adolescent phase, as the adolescent is seen as an active agent, closely involved in exploring and making identity commitments (La Guardia, 2009). Erikson (1968), provided the following descriptive phrases for the identity construct, "a normative crisis"; "a subjective sense of an invigorating sameness and continuity"; "a unity of personal and cultural identity"; "a process of simultaneous reflection and observation".

Erikson believed identity to be a subjective sense of wholeness, conscious and unconscious, compiled of synthesised identifications, representative of the person's psychosocial stimulus value, for him or herself, and for significant others in the community. The stage of adolescence which seems to provide for identity formation through social and psychological processes is therefore an important stage, influencing many aspects of an individual's life thereafter (Erikson, 1982).

Among others, identity formation represents the process through which the identity of a person is formed, and this is influential in vocational choice, religious beliefs, political ideology, and spousal and parental roles. It further employs a stage framework in which the task of forming a sense of personal identity is one of the principal developmental concerns for the time period between adolescence and the attainment of adult status within the community.

The success in dealing with the tasks of identity formation is largely dependent on the success achieved in prior stages of developmental tasks. In turn, the success achieved with respect to forming a meaningful sense of identity will determine to a large extent the probability of success in coping with the demands of later stages. Erikson, however, states clearly that the social and historical context in which the individual functions contributes heavily to the eventual outcome of the process of identity formation, in terms of the probability of success and the content of the identity commitments chosen (Erikson, 1968).

This thought resonates somewhat with Bronfenbrenner's emphasis on the proximal processes or interactive relations an individual forms with other human beings and his or her environment (Bronfenbrenner, 1979). In the current research investigation, this idea is illuminated in the interactions of the participants with the various individuals in other systems, such as teachers, the researcher, community members and friends in school. The experience of the specific interactions of the participants with the researcher, and the interaction with the domain of music is of interest.

### **2.2.3 Emotional and social well-being of adolescents in a socially disadvantaged area**

The sample in this study was drawn from a previously disadvantaged community in the Western Cape province of South Africa. The Western Cape currently has a population of approximately 4,5 million people, and a large number of them reside in the Cape Metropole (Statistics South Africa, 2011).

The previous apartheid regime enforced an ideology which polarised the population of the Western Cape according to assigned categories. Even though political transformation has been in place for 21 years, many previously disadvantaged citizens continue to live under marginalised socioeconomic conditions (Bekker & Cramer, 2003). Oosthuizen and Nieuwoudt (2003) illustrate that more than a third of the poverty in the Western Cape is to be found in communities that were disadvantaged under the previous dispensation. The average household in the particular participants' community can be described as falling in a mid-to-low socioeconomic status. In 2011 the statistics for the particular areas indicated that between 15.2% and 19.1% of residents were unemployed (Statistics South Africa, 2011).

Many residents in this community work in the agricultural sector, and specifically as labourers in the wine industry. Maree (2000) explains that the history of discrimination, economic disadvantage and other social ills, associated with this industry resulted in ongoing experiences of exclusion and disadvantage. Problems experienced include high rates of unemployment, poverty, overcrowding, substance abuse and high levels of criminal and domestic violence (Van der Merwe & Dawes, 2000).

Communities that are characterised by the above-mentioned levels of social disorder and also often breakdown of the family structure offer a context in which adolescents may experience affective difficulties that may present in negative conduct. The support to navigate developmental tasks successfully (Pinnock, 1997), may also not be readily available. Cooley, Turner and Beidel (1995) found that the exposure of adolescents to a community that is characterised by social disorder may result in externalising behaviours, such as impulsivity, aggression and antisocial acts.

The adolescents that were part of this study attend a high school in a semi-rural area in the Winelands of the Western Cape. The high school attracts 95% of its learners from the surrounding farms and the rest of the learners are from the town, closest to this school, itself and surrounding urban areas. The majority of learners are from Afrikaans-speaking homes (University of Stellenbosch School Partnership Project, 2010).

#### **2.2.4 Academic development of the adolescent**

Erikson's life-span theory of development clearly defined the life task of adolescence as the period of identity formation. He viewed the emergence of a healthy personality as a continual progression through successive developmental crises towards self-acceptance and well-being. Other authors agree with Erikson that adolescence and young adulthood provide the first real opportunity to develop a sense of continuity with the past, meaning of the present, and direction for the future (Marcia, 1994). Identity consolidation thus emerges as the cornerstone of the capacity to do well and forms the basis of self-acceptance and self-esteem.

Erikson contested that it was in the quality of fit between the developmental needs of adolescents and the nature of the social opportunities afforded to them by adults that one can find answers to the question why a certain segment of adolescents show academic, social and emotional success, and others do not (Erikson, 1982). A large portion of South African adolescents are rooted in debilitating social conditions that include poverty, lack of healthcare, family and community violence, discrimination, underfunded and overwhelmed schools, fragmented nuclear and extended families, and the absence of wholesome after-school and community programmes for youth (Maree, 2000).

The above-mentioned conditions may undermine the fulfilment of adolescents' basic physiological needs (e.g. safety) and their basic psychological needs for trusting and accepting relationships with adults and peers; for self-expression and exploration; and for developing their academic and social competencies in the direction of viable occupational and social ends (Erikson, 1968).

Thus, the academic success of adolescents occurs within the microsystem of Bronfenbrenner's nested systems model, as previously described. The psychosocial needs of adolescents play a critical role in their academic achievement. Several studies have illustrated that social support has a positive effect on adolescents' health and well-being (Lindsey, Joe & Nebbitt, 2010; Danielsen, Wiium, Wilhelmsen & Wold, 2010).

Equally, stress has negative effects on health and well-being, and on academic success (Flouri & Kallis, 2011). These results further emphasise that social support mitigates the detrimental effect of stress. Cohen, Gottlieb and Underwood (2000) assert that beliefs of perceived social support may reduce or even annihilate stressful situations and prevent or alter maladaptive behavioural response. It may further alleviate the harmful effects stress appraisal by providing a solution to a problem, in terms of health or academic success.

These potential harmful effects of interactive influences among individuals and their environments remind us of Bandura's notion of reciprocal determinism which presents a fundamental point of departure for his social cognitive theory (Bandura, 1997; Woolfolk, 2010). In the following section this theory will be explored and described as it might pertain to the current study.

### **2.3 THE SOCIAL COGNITIVE THEORY OF BANDURA**

The social cognitive theory departs from an agentic perspective to human development, adaption and change. This theory stipulates that people are agentic operators in the course of their lives. The sensory, motor and cerebral systems are tools which people use to achieve tasks and goals, which give direction and meaning to their lives (Bandura, 1999). Individuals are not autonomous agents, neither are they mechanical conveyors of animating environmental influences. Cognitive processes are not only emergent brain activities, they also have a determinative influence. Bandura (1999) stipulates that the human mind is

generative, creative, proactive, and self-reflective – not only reactive. People operate as thinkers of the thoughts that serve determinative functions. Thoughts are constructed about future courses of action, and further assess the likely functional value, organise and deploy strategically selected options, and evaluate their thinking based on the effects which their actions produce, and make whatever changes may be necessary.

### **2.3.1 Triadic reciprocal causation**

The social cognitive theory explains psychosocial functioning in terms of triadic reciprocal causation (Bandura, 1986). In this model of reciprocal causality, internal personal factors in the form of cognitive, affective and biological events; behavioural patterns; and environmental events all operate as interacting determinants that influence one another bidirectionally (Bandura, 1999).

The theory further distinguishes between three types of environmental structures (Bandura, 1997). These are the imposed environment, the selected environment, and the constructed environment. The various forms of environment denote levels of changeability requiring the exercise of increasing levels of personal agency. The enforced physical and sociostructural environment is thrust upon people, whether they like it or not, and although they have little control over its presence, they have a choice regarding the way they construe, and react to it. The part of the potential environment that becomes the actual experienced environment, depends largely on people's behaviour. Individuals have a choice in their associates, activities and milieus, and these constitute the selected environment. People thus construct their social environments through their own efforts. The construction of environments affects the nature of the reciprocal interplay between personal, behavioural, and environmental factors (Bandura, 1997).

### **2.3.2 Cognitive processes**

The effects of self-efficacy confidence in cognitive processes take a range of forms. Human behaviour, to great extent, is purposive, and regulated by forethought embodying specific goals. Personal goal-setting, on the contrary, is influenced by self-appraisal of capabilities. The stronger the perceived self-efficacy, the higher the goal challenges that individuals set for themselves, and the firmer their commitment to these (Bandura, 1991).

### **2.3.3 Conception of ability**

A belief system of principles that affects cognitive functioning is one way a person construes ability (Bandura & Dweck, 1988). A child that regards ability as an acquirable skill that can be increased by gaining knowledge and competencies will adopt a functional-learning goal. These children seek challenges that provide opportunities to expand their knowledge and competencies. They are not easily distracted by difficulties. Their capabilities are judged in terms of personal improvement, rather than by comparison against the achievement of others. Children who regard their capability as an inherent capacity view performance as diagnostic of their inherent intellectual capacities. Deficient performances are viewed as high evaluative threats that they may lack basic intelligence. Children prefer tasks that minimise errors and reveal their proficiency, at the expense of expanding their knowledge and competencies. When children need to exert a high level of effort, it is also sometimes perceived as a threat, as it can, they presume, reveal that they are not clever. The successes of others belittle their own perceived ability.

### **2.3.4 Motivational processes**

Self-belief of efficacy therefore plays a key role in the self-regulation of motivation (Bandura, 1991). Human motivation is mostly cognitively generated, as people motivate themselves and guide their actions by the action of forethought. They develop convictions about what they are capable of and anticipate the outcomes of the prospective actions (Bandura, 1991).

### **2.3.5 Affective processes**

People's beliefs in their capabilities affect how much stress and depression they experience in threatening or difficult situations, as well as their level of motivation (Bandura, 1986). This is the emotional mediator of self-efficacy belief. Perceived lack of efficacy to exercise control over stressors plays a central role in anxiety arousal.

### **2.3.6 Construction of knowledge and competencies**

Social cognitive theory postulates a multifaceted causal structure that addresses both the development of competencies and the regulation of action (Bandura, 1986). Knowledge structures representing the models, rules and strategies of effective action serve as cognitive guides for the construction of complex patterns of behaviour. These knowledge structures are shaped from the styles of thinking and behaviour that are modelled from the outcomes of exploratory activities, verbal instruction, and innovative cognitive syntheses of acquired knowledge.

In the development of their competencies, people transform and process diverse sources of information, derived from enactive experiences, social guidance and modelling influences, and integrate these into cognitive models that serve as guides for reasoning and action (Bandura, 1986).

Among the mechanisms of human agency, the confidence in personal efficacy is one of the most central (Bandura, 1997). Other factors may serve as motivations and monitors, but these are all rooted in the core conviction that one has the power to produce desired effects by one's actions. Self-efficacy beliefs regulate human functioning through cognitive, motivational, affective, and decisional processes. These affect the ways in which individuals think in self-enhancing or self-debilitating ways; how well they can motivate themselves and persevere in the face of difficulties; the quality of their emotional life, and the choices they make at important decisional points which set the course of life paths (Bandura, 2002). Various large-scale meta-analyses have been conducted on findings from studies with diverse experimental and analytic methodologies applied across diverse spheres of functioning (Boyer et al., 2000). The collective evidence from the research verifies that efficacy beliefs contribute significantly to the quality of human functioning.

### **2.3.6 The role of self-efficacy and self-esteem in the adolescent**

A primary component in the building and maintenance of physical, emotional and spiritual well-being is self-esteem. Healthy self-esteem encompasses feelings of actual and perceived competency and self-efficacy, as well as feelings of being lovable or approved of.

Bandura (1977) defined self-efficacy as the belief that we are capable of doing something and that we can influence events that affect our lives.

Self-esteem, of which self-efficacy forms part, is undoubtedly a valuable psychological resource. Maslow (1973, p 121) argued that self-esteem was not only necessary for well-being, but that the need for self-esteem is genetically programmed into human beings. Self-esteem has its roots in the development of the self-concept, which includes the overall view that human beings have of themselves. Harter (1999, p. 81) describes the self-concept as “a composite image of what we think we are, what we think we can achieve, what we think others think of us and what we would like to be”. Individuals generally behave according to the internal picture of their self-concept.

An important aspect of healthy self-esteem is the way in which individuals evaluate their self-concept, usually in comparison with the ideal self. It is important to distinguish between self-evaluations that represent global characteristics of the individual, and those that reflect the individual’s sense of adequacy across particular domains such as, for example, cognitive competence, social competence and athletic competence (Harter, 1999). Self-evaluation is heavily influenced by the way in which individuals perceive other people’s reactions to themselves. Individuals evaluate the reactions of the significant people in their lives, to determine whether they are loved, accepted and approved of. This process starts with a young child’s earliest interactions, where “the infant needs to be able to discover his/her capacity to light up the mother’s face – for here is to be found the fundamental basis of ... self-esteem” (Casement, 1990, p.93).

Self-efficacy, in general, involves own “beliefs in one’s capabilities to mobilize the motivation, cognitive resources, and courses of action needed to meet the given situational demands” (Woolfolk, 2010). Self-efficacy is a socially constructed individual attribute, described as a complex and malleable construct rather than a personality trait (Pajares & Miller, 1995). It is associated with Bandura’s Social Cognitive Theory, which postulates a triadic, reciprocal, causal relationship between individuals’ social environments, behaviours and cognitions (Bandura, 1986). In an academic context, self-efficacy refers to the subjective belief that one can successfully carry out given academic tasks at designated levels (Bong, 2004; Woolfolk, 2010).

Further, self-efficacy has important implications for behaviours in a variety of life domains, throughout an individual's life course (Grabowski, Thiede-Call, & Mortimer, 2001). In research literature it is indicated that sources of self-efficacy emerge in several important social environments or contexts, such as family, recreation, faith traditions and beliefs (Staples, Schwalbe & Gecas, 1984), with most focusing on processes that unfold in the workplace or educational settings.

Bandura (1977) suggested that people who have perceptions of high self-efficacy often perform better than those who have an equal ability but lesser belief in themselves; they are more likely to persevere with difficult tasks and to use more effective problem-solving strategies, and they also have a tendency to set themselves more demanding goals and to focus less on the possible consequences of failure. Bandura illustrated how children internalise the standards of those adults who are important to them and how these standards then become self-imposed. He argued that these self-controlled consequences of behaviour occasionally become more powerful than consequences from the external environment (Bandura, 1977).

The effects of self-efficacy beliefs on cognitive processes take on a variety of outcomes. Human behaviour is regulated to a large extent by forethought embodying cognised goals. Personal goal-setting is influenced by self-appraisal capabilities. The stronger the perceived self-efficacy, the higher the goal challenges people set for themselves, and the firmer the commitment is towards the goal (Bandura, 1991).

The conception of human ability has undergone significant change. Ability is not a fixed attribute, located in an individual's behavioural repertoire; it is now seen as a generative capability in which cognitive, social, motivational, and behavioural skills must be organised and effectively orchestrated to serve a variety of purposes. It further involves skill in managing aversive emotional reactions that can impair the quality of thinking and action. There is a clear difference between possessing knowledge and skills, and being able to use them well under challenging conditions (Bandura, 1977).

The self-efficacy contribution to skill utilisation is illustrated in a study by Collins (1982). She illustrated that positive attitudes towards mathematics were better predicted by perceived self-efficacy than by actual ability. This study illustrates that individuals who perform poorly may do so because they lack skills, or because they have the skills, but lack the sense of efficacy to use them well. Wood and Bandura (1989) tested the notion that conceptions of ability affect thought processes and performance attainment through the self-efficacy mechanism. A group of individuals that viewed ability as reflecting an inherent intellectual aptitude revealed plummeting levels of efficacy as they encountered problems and they further became erratic in their analytic thinking. The group that viewed conception of ability as an acquirable skill fostered a highly resilient sense of personal efficacy. Individuals under this belief system remained steadfast in their perceived efficacy, continued to set challenging goals, and used analytical strategies in efficient ways.

Self-belief of efficacy plays a key role in the self-regulation of motivation. Most human motivation is cognitively generated. Individuals motivate themselves and guide their actions anticipatorily by the action of forethought. In this way they form beliefs about what they can do. They anticipate likely outcomes of prospective actions. They further set goals for themselves and plan courses of action designed to realise possible and valued futures. Forethought is translated into incentives and appropriate action through self-regulatory mechanisms (Bandura, 1991).

A distinction can be made between three different forms of cognitive motivators. These include casual attributions, outcome expectancies, and cognised goals. Self-efficacy beliefs operate in these various forms of cognitive motivation. These beliefs influence casual attributions. Individuals who view themselves as highly efficacious contribute their failures to insufficient effort, and those who regard themselves as inefficacious attribute their failures to low ability (Alden, 1986; Collins, 1982). Casual attributions affect motivation performance and affective reactions mainly through beliefs of self-efficacy (Chwalisz, Altmaier & Russel, 1992).

Expectancy-value theory departs from the premise that motivation is governed by the expectation that behaviour will produce certain outcomes. The motivating potential of outcome expectancies is partly governed by self-beliefs of capability (De Vries, Dijkstra & Kuhlman, 1988).

The capacity to exercise self-influence by personal challenge and evaluative reaction to an individual's own attainments provides a major cognitive mechanism of motivation. A large body of evidence indicates that explicit, challenging goals enhance and sustain motivation. Goals operate largely through self-influence processes rather than regulate motivation and action directly (Locke & Latham, 1990).

In order to understand the cognitive functioning of an adolescent as being dependent in part on social-cognitive influences in the form of, among others, a sense of self-efficacy and interactive relations with different aspects of the environment in which they function, it seems also imperative to explore the neurological development that occurs during the adolescent phase.

## **2.4 NEUROLOGICAL DEVELOPMENT OF THE ADOLESCENT**

During early adolescence, large alterations in hormone levels and physical changes occur. It is a period of significant neural plasticity, a process through which thinking and learning transform the brain's physical structure and functional organisation (Suleiman, Johnson, Shirtcliff & Galvan, 2015).

A model of adolescent brain development, the Dual Systems Model, suggests that adolescents may experience a temporal gap between a relatively early maturing affective system and a slower maturing cognitive control system (Steinberg, 2008). The early maturing affective/approach system is hypothesised to be a result of increases in dopaminergic activity and subcortical brain structures such as the ventral striatum, leading to increases in reward seeking and need for novelty. In comparison, the slower maturing cognitive control network is due to development in the prefrontal cortex, responsible for planning, judgement, and inhibition, and is assumed to be not fully mature until the individual reaches his or her mid-20s (Ernst, Pine & Hardin, 2006). These changes include an increase in the efficiency by which messages can transfer along the neurons within the brain

as a result of myelination of neurons and physiological ‘pruning’ of neurons to remove unnecessary synaptic connections (Blakemore, 2010). Together these changes promote increasingly efficient functioning within and across networks that involve interconnections between frontal, striatal, thalamic, and brainstem regions, and functional connectivity between major information processing systems. These changes appear to be maximal in early adolescence, with more gradual refinements thereafter (Hwang, Hallquist & Luna, 2013).

Goldman-Rakic (1997) compared the brain’s maturational trajectory to the weaving of a tapestry, starting at a focal point with refinements in the threading emanating from the centre, leading to an increasingly intricate array of interconnections. This analogy leads one to the assumption that most abilities should improve over time, until an adult plateau is reached. One further derives from the analogy that the entire brain is involved even when organisational changes appear to be specific.

Adolescence further represents a biological change, which represents perhaps one of the most salient biological changes that defines the adolescent period (Dahl, 2004). Males and females overtly experience changes in secondary sexual characteristics due to the activation of ovarian and testicular secretions. These activations facilitate sexual strivings and interest in romantic partners. Thus the biological mechanism to promote an important social transition into adolescence includes the concerns with sexual attractiveness to, and social appraisal and approval by potential romantic partners. Receptors for gonadal hormones are present in critical information-processing hubs, including the hypothalamus, amygdala, nucleus accumbens, and orbitofrontal cortex. These regions have been implicated in reward processing and other emotional behaviours (Hwang, Hallquist & Luna, 2013). Thus, reward-based experience may alter the brain’s hormonal tone, and this alteration may have a further impact on the individual’s pursuit of future reward-based experiences.

Cognitive development and scholastic achievement can thus not be understood without taking neurological development into consideration. An understanding of the different intrinsic as well as extrinsic factors that contribute to cognitive development and functioning, and therefore academic and scholastic achievement, may therefore lead to

potential effective interventions in order to enhance the said functioning. In the following section, music therapy will be described and motivated as one such possible intervention.

## **2.5 MUSIC AS THERAPY**

### **2.5.1 Music as facilitator of social and personal development**

Music with its varying harmonies, melodies, tempos and rhythms reflects an aspect of human existence (Pavlicevic, 1997). Rosenfeld (as cited in Nicol, 1996) claims that humans react to music with a mixture of psychological and physiological reactions which are stimulated by different aspects of the music itself. It would seem that music has an effect on the functioning of the human being as an entity. Music, more so than the spoken word, meets with little or no intellectual resistance and does not need to appeal to logic to initiate action. It is more subtle and more primitive than the spoken word and therefore its appeal is wider and greater (Altschuler, 2001).

Bruscia (1989, p. 192), describes music therapy as “a systematic process of intervention wherein the therapist helps the client to achieve health, using musical experiences and the relationships that develop through them as dynamic forces of change”. The American Music Therapy Association (AMTA)(1998) describes music therapy as the clinical use of music in healthcare and educational settings to promote the wellness and health of patients and decrease their overall stress. Music is used therapeutically to address all-round or various needs and issues in the client’s life through direct playing thereof or through developed relationships between client and therapist while occupied with music (Jamabo & George, 2014).

The goals for change in music therapy may be in the areas of attention, concentration, impulse control, social functioning, self-esteem, self-expression, motivation and cognition. A basic assumption of music therapy is that musical behaviours, such as the way an individual plays a musical instrument, reflect and corresponds with underlying psychological functions. Systematic musical interventions in music therapy may lead to changes in a client’s musical behaviour, and those may be indications of a psychological change. The change may reflect

a greater degree of affective self-regulation (such as impulse control), increased social perception (awareness of the music created by others in the group), an expansion of the range of self-expression (awareness and tolerance of various emotions) (Pelliteri, 2000).

Music is defined as “organized sounds and silences in a flow of time” (Eagle, 1978, p. 231). The auditory and temporal characteristics of music contribute to the uniqueness of music therapy. Music has been shown to have a characteristic frequency distribution that is skewed towards positive emotions (Juslin & Laukka, 2004; Zenter, 2008).

Evans (1986) has shown that adolescents with learning barriers are thought to exhibit a certain amount of internal arrhythmia or dysrhythmia. Adolescents with attention deficit hyperactivity disorder (ADHD) are often unable to inhibit their motor responses to the stimuli around them, and therefore find it difficult to restrict their inappropriate behaviours independently. Self-control is the precursor to the development of higher executive functions, and therefore provides a critical foundation for the performance of basic tasks.

Gaston (1968) has suggested that rhythm activities can facilitate internal organisation, the coordination of mind and body, and, by providing a sense of internal security, can help with the control of impulses (Bruscia, 1987).

Edison (1989) examined the effects of a behavioural music therapy treatment programme on a group of socially disadvantaged adolescents, aged 12–16 years. Experimental subjects’ scores for classroom behaviour were almost twice as stable as scores for control subjects. In a single case study with an adolescent boy who was diagnosed with conduct disorder, Kivland (1986) found an increase of positive self-statements following individual music therapy sessions, and that hospitalised adolescent psychiatric patients involved in music therapy programmes improved more than the control groups on measures of self-esteem. Thaut (1989) measured self-perceived positive changes in states of relaxation, mood/emotion and thought/insight in psychiatric patients before and after music therapy. There were three different music therapy techniques used in this study, and all three proved to be positive in changing the psychiatric patients’ self-perceived states of relaxation, mood/emotion and thoughts about self. Montello and Coons (1998) attempted to evaluate the effects of active rhythm-based versus passive listening-based group music

therapy treatment on adolescents with emotional, learning, and behavioural disorders. They found that subjects improved after receiving either passive or active intervention, particularly on the aggression/hostility scale. Rickson and Watkins (2003) found that a music therapy programme increased adolescents' awareness of the existence and feelings of others, and assisted in the development of positive relationships with peers. They found that rhythm activities facilitated internal organisation, and helped with impulse control.

### **2.5.2 The neurological effect of music on emotional and cognitive processes**

The element of rhythm in music enters intimately into the problem of music therapy. People are essentially rhythmical beings. There is rhythm in respiration, heartbeat, speech and more. The cerebral hemispheres are in a perpetual state of rhythmical movement from night to day. Changes in the body, such as the opening and closing of eyelids causes a change in brain rhythm. Life in a rhythmical universe adds more responsivity to musical rhythm. Man-made rhythm is thus a replica of cosmic and bodily rhythm (Altschuler, 2001).

Mounting evidence indicates that making music, dancing and listening to music activates a multitude of brain structures involved in cognitive, sensorimotor, and emotional processing (Koelsch & Siebel, 2005; Koelsch, Siebel & Fritz, 2010; Zatorre, Chen & Penhune, 2007). Functional neuro-imaging studies have shown that music-evoked emotions involve core structures of emotional processing. The first study which showed modulation of amygdala activity with music was important for two reasons: firstly it supported the assumption that music can evoke real emotions, thus emotions evoked by music show activation in the core structures of emotion processing. Secondly, music therapeutic approaches for the treatment of affective disorders were strengthened, as affective disorders such as depression and anxiety are partly related to amygdala dysfunction (Stein, Simmons, Feinstein & Paulus, 2007; Koelsch, Offermans & Franzke, 2010).

Functional neuroimaging studies on music and emotion all bear a striking resemblance; they all report activity changes within the (anterior) hippocampal formation (Blood & Zatorre, 2001; Baumgartner, Lutz, Schmidt & Jänke, 2006; Koelsch, Sammler, Jentschke & Siebel, 2008). Koelsch et al. (2008) have argued that the hippocampus plays an important role for the generation of tender positive emotions (joy and happiness), and one of the

powers of music is to evoke hippocampal activity related to such emotions (Koelsch, et al., 2010). A widely cited neuroscientific theory, the trion model (Leng and Shaw, 1991), posits that music resonates with inherent neuronal firing patterns throughout the brain, thus music listening and instruction can prime the brain for improved performance on spatiotemporal and other cognitive tasks. Rauscher (2002), and Schellenberg (2001) contend that the learning which occurs during music instruction, may transfer to other tasks. Cognitive development and scholastic achievement is thus closely linked to the effect of music on neurological functioning, and this relates directly to the current music therapeutic intervention, and the possible effect thereof on cognitive development and academic achievement.

## **2.6 DJEMBE DRUMMING AS A FORM OF MUSIC THERAPY**

### **2.6.1 Percussion as a means to learning**

The primary element of the drumming experience involves rhythm. Berger (2002) departs from the premise that rhythm is a phenomenon inherent in all natural and cosmic processes. The capacity for rhythm is not only innate, but also a necessary part of human functioning. The rhythmic foundations of basic processes, such as attention, memory, language, skilled motor activity, interpersonal interaction, and aesthetic appreciation, are described by Evans (1986). He goes on to explain that the disruption of these natural capacities may result in disorders of learning and behaviour. Healthy psychological functioning are thus influenced by rhythmic synchronisation and order. Birkenshaw (1982) concurs with Evans's viewpoint, and holds that the acquisition of "inner rhythmic sureness" is among the most vital developments of a young child, necessary for other learning, including reading and writing.

Stevens and Burt (1997) note that drumming is a cognitive process which encourages perception; selective, focused attention; and long- and short-term memory.

### **2.6.2 The potential of drumming to enhance emotional and personal development**

Berger (2002) notes that drumming is "a social unifier, requiring no particular 'training' in order for it to be experienced and enjoyed in a group". Stevens and Burt (1997)

emphasise the psychological benefits of group drumming, and conclude that the drum circle possesses several inherently therapeutic elements. The authors firstly highlight the accessible nature of drumming, which renders the activity inclusive of most people, and ensures the experience of success (Stevens & Burt, 1997). Secondly, the aesthetic elements of drumming fulfil the basic human desire to create and experience beauty. Thirdly, drumming can facilitate emotional expression and affective modulation. Feelings related to the unconscious find direct expression through this non-verbal medium. Fourthly, the physical nature of drumming is highlighted, which requires psychomotor coordination and thus facilitates the engagement and cooperation of body and mind. Fifthly, drumming facilitates communication. According to Stevens and Burt (1997, p. 135) “[l]istening, imitation, and validation are among the many communication skills practiced in the drum circle. Being listened to is extremely therapeutic, and an individual playing on a drum can make themselves heard”. In addition, these authors assert that there is a metasocial nature to drumming, as normal social interaction is transcended by the sense of community that is created by a group of people, united by a common rhythm.

Wigram (2002) noted that when two or more individuals engage in musically expressive behaviour, they are communicating, and effectively ‘talking’. Contact is thus established, and contact is fundamental to all other development. The building of proximal relations as espoused by the developmental theories of Bronfenbrenner can thus be facilitated by engagement in musically expressive behaviour. Steen-Moller (1996) formulated a model of developing contact through musical activities. She proposed five levels of contact that developed in a sequential way through musical participation. The initial level pertains to the absence of noticeable awareness of the other. The goal for the facilitator is to provide an atmosphere of warmth and safety, and thereby encourage the participant’s awareness of the environment, and the others present (Wigram, 2002). At the second level, this awareness has been established, and enhanced through the use of music and sound. Awareness of the self, however, is usually limited, and the goal becomes to enhance consciousness of the individual’s personal musical expressions (Wigram, 2002). During the third level, realisation of the individual, of the potential use of musical sounds to influence his or her environment, occurs, and the individual begins to take initiative in evoking reactions. The goal is to further encourage the individual’s active participation and sense of

control, while simultaneously promoting his or her awareness of the communicative value of the events (Wigram, 2002).

At the fourth level, the individual has a clear sense of the musical and non-musical interaction that is taking place, and the interaction has evolved into a dialogue. The goal is to further the individual's awareness of the reciprocal communicative potential of the interaction, and to further empower him or her to take the initiative in authentic self-expression (Wigram, 2002). During the fifth level, awareness of the self, the environment, and of interactions, has been established. Objectives during this stage include nurturing the sense of autonomy and agency which has developed, and to further develop the communicative skills, such as flexibility, creativity, listening, and response to content (Wigram, 2002). Such a sense of autonomy and agency seems reminiscent of Bandura's sense of self-efficacy.

An individual's ability to make contact is considered to be fundamental to psychological well-being. An adolescent's inability to make and sustain contact, whether it is with peers, family, or others in positions of authority, can contribute to many forms of affective, behavioural and learning disorders (Blom, 2006).

Djembe drumming has been discussed above in terms of a form of non-verbal communication. Non-verbal communication is essential to work and communicate with children and adolescents, and is thus a vital aspect of play therapy (Van der Merwe, 1996). Play therapy as an intervention differs from other forms of psychotherapy in that it allows the adolescent to express feelings, communicate thoughts and ideas, and narrate events and occurrences, all without the use of words (Blom, 2006). Blom (2006) is of the opinion that music and rhythm are underestimated with regard to their communicative capacity, and this is a component which can assist the adolescent to express or convey that which he or she is attempting to put into words.

### **2.6.3 Drumming to strengthen the sense of self**

A significant aspect of personal expression in drumming is the ability to place individuals in touch with themselves. Winkelman (2003) proposes that drumming assists in the connection of self by promoting personal reintegration. Seaman (2003) and Mikenas (2003),

both founders of drumming projects, agree that drumming enhances the ability of an individual to connect with him- or herself. Barry Bernstein, a clinical music therapist, believes that drumming is the healthiest, most accessible and most effective way for humans to connect with their inner selves (Skeef, 1999).

In essence, adaptive contact with others is not possible without adequate contact with the self (Corey, 2005). Furthermore, adequate contact with the self cannot occur without sufficient awareness, and this implicates an individual's ability to recognise and accept aspects of his or her inner and outer world (Corey, 2005). Friedman (2000) describes drumming as an activity that can bring a person directly into the present moment. The contact is facilitated by promoting the individual's capacity for sensory awareness and perception (Blom, 2006).

#### *2.6.3.1 Defining the self*

Nichols and Honig (1997) contend that young children learn about their own feelings and moods through listening to music, singing songs, and by expressively moving to music. Rhythmic elements of music can facilitate sensory and body awareness, and harmonies can lead to an improved understanding of their own, and others' moods and feelings. Music can further introduce language and stories of their own, and other cultures through the singing of folksongs, and the experience of different sounds, rhythms, harmonies, instrumentation, and styles of music.

Oaklander (2006) describes music activities as an opportunity for an individual to make "self statements", and they thus serve to enhance personal identity. When a statement about the self is articulated, musically or verbally, the self-support resources in the individual increase (Oaklander, 2006). Ruud (1998) hypothesises that by being actively involved in music, we, as individuals, are "performing a sense of ourselves, our identities", and in the process, reiterating the self.

Ruud (1998) further describes how musical experiences may add an existential dimension to one's identity by assisting new awareness of undiscovered aspects of the self. The individual may experience new meaning being added to his or her identity, and this may become "rooted in transpersonal space" (Ruud, 1998, p.110).

### 2.6.3.2 *Experiencing mastery*

Oaklander (2006) hypothesises that the individual cannot achieve a satisfactory sense of self without experiencing mastery. This experience pertains to Erikson's theory (as discussed in section 2.2.2), concerning the middle childhood stage of development, when the experience of industry, mastery and competence (versus lack of industry and feelings of failing and inferiority) are fundamental in a child's development (Zembar & Blume, 2009).

The adolescents that participated in the present research investigation may not have conquered this stage of development. Children who have experienced disrupted, abusive lives may have frequently had to forgo many opportunities for normal childhood play, exploration and discovery, and therefore may not have experienced mastery (Oaklander, 2006). As previously referred to in Bandura's concept of the sense of self-efficacy, mastery experiences contribute to adolescents becoming aware of tasks that can be successfully negotiated, which therefore lead to a heightened sense of self-efficacy.

A group drumming activity has the potential to encourage the adolescent's sense of mastery, in part because of the child and adolescent's intrinsic motivation to engage in musical activities. Owing to the accessible nature of drumming as a form of creating music, and because the drumming technique is relatively simple, the result is often an experience of success (Stevens & Burt, 1997). Positive experiences of success, praise and acknowledgement can enhance self-esteem and further empower the individual to continue in an increasing trajectory of high self-worth and efficacy (Ruud, 1998).

### 2.6.3.3 *The ability to be playful and use the imagination*

The natural capacity for a child and adolescent to be playful and imaginative is central to the development of self (Oaklander, 2006). Traumatic and disruptive life experiences can hamper normal growth if the child and adolescent's innate tendency toward humour and playfulness is suppressed (Oaklander, 2006). These are critical childhood resources of strength and resilience, and Oaklander highlights the importance of providing children and adolescents with opportunities to play, in an attempt to proceed with normal development (Oaklander, 2006).

Kalani (2004) agrees that group drumming should be fun and playful, and, in view of Oaklander's statements, may be central to normal emotional and social adaptation. Glover and Young (1999, p.96) theorise that the child's musical behaviour is playful and imaginative, and that "this quality is vital to all musical experiences of whatever kind and at all ages". The playfulness in terms of music participation is not abandoned in the later years, but rather expanded to incorporate greater cognitive and emotional appreciation (Glover & Young, 1999).

## **2.7 LEARNING SUPPORT**

### **2.7.1 The role of educational support professionals**

Learning support refers to the role that educational support professionals (such as educational psychologists, school counsellors, therapists, special educators, and learning support specialists) and mainstream teachers play in addressing the diverse needs of learners. According to the Salamanca Framework for Action, a continuum of support should be provided in an attempt to reduce exclusion from the curriculum and the school as a community. This process facilitates the development of inclusive schools (Engelbrecht, 2001).

Booth (2000), defines learning support as "all activities that contribute to the capacity of a school to respond to the diversity" of its learners. With reference to the Learning Support Model suggested by the Western Cape Department of Education (WCED), this translates to learning support provided by mainstream teachers on level one, in collaboration with the learning support teacher and Institution Level Support Team, as well as other educational support professionals. At level two, it refers to temporary withdrawal from the mainstream class for small-group instruction by the learning support teacher. The support which is thus provided is in collaboration with the mainstream teacher and other role-players in and outside the school. Level three and four of the model specifies that learners will be referred to special schools for a higher level of support (Dreyer, 2008).

### **2.7.2 The way in which drumming can function as learning support**

Berry (1997), and Gifford, Correa-Velez and Sampson (2009) agree that a positive, supportive and inclusive immediate social environment can be seen as essential to the continuing well-being of marginalised adolescents. Saether (2008) views school-based music activity as a “tool for inclusion”, and Mathieson (2004, p. 227) states that “art, music, dance, poetry or storytelling in the framework of the child’s cultural heritage are expressive tools for traumatized children, helping to integrate the past, present and future in a way that restores a sense of identity, meaning, continuity, and belonging”.

Osborne (2009, p. 150) described socially coherent psychobiological outcomes of marginalised adolescents’ participation in music and movement activities in music therapy programmes as follows: “[M]usic may also entrain, coordinate and synchronize movement between individuals, offering the excitement, satisfaction, security, comradeship and cohesion of playing and moving rhythmically together”.

Learning is a process during which a stable change in behaviour is produced through experiences, and this process is consolidated with the acquisition of a series of capacities, or skills, in the motor, affective and cognitive domains (Shuell, 1986). Socially disadvantaged adolescents may have experienced failure and frustration caused by underachievement, which in turn could lead to a lack of motivation. Experiences with group drumming can potentially strengthen adolescents’ self-confidence, and self-efficacy, and increase their motivation in school-based activities (Pavlicevic, 1994). Drumming sessions can also contribute to social interaction within peer groups, which might also be beneficial to collaborative learning, according to Vygotsky (cited in Donald, Lazarus & Lolwana, 2010) who described learning as a social activity.

Musical activities can appeal to the auditory, visual, motor, kinaesthetic and emotional processes, simultaneously. These can provide multisensory stimulation, which is regularly recommended by learning support specialists (Pavlicevic, 1994).

## 2.8 SUMMARY

The aim of this chapter was to provide a literature review of adolescents' experiences of engaging in drumming activities. Research into adolescents' experiences included a review of the Bronfenbrenner's Bioecological Model, where the individual is seen to be a system immersed in an ecological system consisting of multiple levels. Adolescence as a concept was investigated, and Erikson's Psychosocial Theory, in particular, was explored. The context of the participants of this research investigation was examined and discussed in terms of the effects of their particular context on their development, and ultimately of this research investigation. The social cognitive theory of Albert Bandura was chosen as the theoretical framework, and this theory was discussed in terms of the experiences of adolescents and the influence on their learning. The neurological development of the adolescent's brain in relation to learning was also discussed.

The therapeutic effects of music were investigated in terms of the influence on learning and cognitive processes. Djembe drumming, as a particular form of music therapy, was investigated, as well as the way in which it can possibly function as learning support.

In Chapter 3 the research methodology will be presented, as well as the context in which the research was carried out, including the selection of participants, and the nature of the data collection methods used.

## CHAPTER 3

### RESEARCH DESIGN AND METHODOLOGY

#### INTRODUCTION

The purpose of this research investigation was to explore the experiences of adolescents by using a djembe drumming group as an activity to support and increase self-esteem and build a sense of self-efficacy. In doing so, the researcher aimed to conceptualise the meaning that drumming gave to the adolescents' experiences and to gain insight into the extent to which drumming could serve as an intervention to support learning and academic development.

In Chapter 2 the theories were described that provide a framework for the way in which the adolescent learns, and the potential impact of music therapy upon this learning process. Chapter 2 further provided a review of the literature regarding this process. In this chapter, reference is made to the research questions and the purpose of the study, while a more extensive explanation of the research paradigm and design is given than in Chapter 1. The research methodology applied in the investigation is presented, including the context in which the research was carried out. The manner in which participants were selected and the nature of the data collection methods utilised are also described. The methods of data collection included observation, focus group interviews, journal entries of the participants, and reflective diary of the researcher. The information pertaining to the analysis of data, verification of the research findings, as well as the ethical considerations which were adhered to throughout the study, are also put forward in this chapter. The chapter then concludes with a brief summary of the discussions provided.

#### 3.1 RESEARCH QUESTIONS

The following research questions were formulated to guide the investigation as well as to address the aims mentioned above. The primary research question which guided the investigation was:

*How does djembe drumming facilitate learning in a group of adolescents?*

In an attempt to gain further insight into the perceptions and experiences of drumming as potential learning support intervention for adolescents, the following secondary research questions guided the study:

1. What are the experiences of participating adolescents of taking part in a drumming group?
2. What specific experiences of participating adolescents can contribute to general improvement in their learning?
3. How do the participant adolescents link the drumming activity with learning?

The purpose of a research investigation is supported by a specific research paradigm or approach to knowledge, and how the methodology is applied within the research design. These are addressed in the next sections.

## **3.2 RESEARCH PARADIGM**

A research paradigm is a system of principles and practices, based on the research investigator's ontological, epistemological and methodological position or approach to knowledge (Terre Blanche & Durrheim, 2006). The nature of the investigation is reflected in these three paradigm dimensions, and these were instrumental in guiding the researcher's thoughts and actions throughout the inquiry (Terre Blanche & Durrheim, 2006). The present study mirrored the nature of the interpretive paradigm, which is discussed below.

### **3.2.1 Interpretive paradigm**

According to Denzin and Lincoln (2008), the interpretive approach attempts to interpret and accord meaning to the world through an exploration of human beliefs, actions and experiences. This approach is subjective in nature and Merriam (2009) states that the researcher's approach to knowledge is reflected in the three dimensions of a paradigm: ontology, epistemology and methodology.

Ontology, as set out in Chapter 1, indicates the nature of reality, which in this study comprised multiple and diverse constructed realities which were contextually bound (Henning, Van Rensburg & Smit, 2004). The research focused on exploring the individual experiences of the participants as they engaged in the djembe drumming activity, since individuals create their own, unique, idiosyncratic activities of reality (Patton, 2002).

Epistemology comprises the connection between what is to be known, as well as the researcher's own relationship with the knowledge (Terre Blanche & Durrheim, 2006). The interaction between these two systems results in the mutual 'shaping' of both parties understandings (Denzin & Lincoln, 2008). Henning et al.(2004) is of the opinion that the contexts in which participants find themselves shape their interpretation and understanding of the world. Within the interpretive paradigm, it is believed that knowledge is socially constructed (Merriam, 2009). In this particular study, the researcher engaged with the participants to record their experiences, as well as the meanings they gave to their mutual social interactions with and experiences of the world (Terre Blanche & Durrheim, 2006). This study applied an interpretive qualitative methodology (Babbie & Mouton, 2010) to gain access to and an in-depth understanding of the participants' perceptions.

Methodology refers to a research procedure consisting of several methods which are applied by the researcher, in an attempt to assist him or her in answering the research question and to produce the knowledge discovered (Terre Blanche & Durrheim, 2006). In the present study, these included observations, journal entries and a focus group interview, which concurrently addressed the purpose of the study and offered the means to verify the data attained (Henning et al., 2004). The interpretive paradigm, with its subjective dimensions, is the "most naturally suited to case study research" (Cohen et al., 2000), as will be discussed later in this chapter.

The selection of a specific research design in a research investigation is guided by the researcher's approach to the nature of information to be understood (Henning et al., 2004). In the following section, a discussion on the methodology utilised is given.

### **3.3 RESEARCH METHODOLOGY**

The process of research methodology is described as a process of selecting the appropriate research methods – those which reflect the researcher's approach to the investigation, as well as the rationale of how this research will be conducted. The process is guided by both the research design, and the researcher's relations with the research setting, the participants, and also the means by which the data will be obtained (Denzin & Lincoln, 2008).

As mentioned in Chapter 1, the participants in the study, the data collection techniques, and the data analysis procedures were selected to enhance the qualitative methodology employed. This enabled the researcher to explore, investigate and gather detailed descriptions of the phenomena involved within the participants' contexts (Babbie & Mouton, 2010). The researcher aimed to gain insight and understanding into the experiences of adolescents while participating in a djembe drumming group, and further sought to comprehend how this experience might have influenced their self-esteem and self-efficacy, and affected their learning.

Merriam (2009) describes qualitative methodology as a “broad methodological approach” to an investigation, where the researcher attempts to understand the uniqueness of events or situations as they happen in a specific context, as well as the interactions between them (Babbie & Mouton, 2010). Merriam further states that the challenge for the researcher is to ascertain what type of qualitative methodology to employ. A basic, qualitative study is used most often, as it involves attempting to discover and understand a phenomenon, a process, or the perspectives and worldviews of the people involved. Denzin and Lincoln (2005) define qualitative research as follows:

*Qualitative research is a situated activity that locates the observer in the world. It consists of a set of interpretive, material practices that makes the world visible. These practices transform the world. They turn the world into a series of representations, including field notes, interviews, conversations, photographs, recordings, and memos to the self. At this level, qualitative research involves an interpretive, naturalistic approach to the world. This means that qualitative researchers study things in their natural settings, attempting to make sense of, or to interpret, phenomena in terms of the meanings people bring to them.*

Merriam (2009) state that a qualitative researcher is interested in how people interpret their experiences, how their worlds are constructed, and what the meanings are that they attribute to their experiences. Thus the aim is to understand how people make sense of their lives and experiences, which renders this methodology appropriate for this research study.

### 3.4 RESEARCH DESIGN

The research design is seen as a framework that allows for the theoretical paradigm as well as the data collection methods to be connected and integrated in a strategic way (Terre Blanche & Durrheim, 2006; Mouton, 2010). Babbie and Mouton (2001) describe a research design as the plan or structured framework of how the researcher intends to conduct the research process, as opposed to research methodology which refers to the methods, techniques, and procedures that are employed in the process of implementing the research design.

The research design resembles a focused guide for carrying out an inquiry. This design can be compared to a plan or map which helps the researcher get from one point to the other – thus from an initial set of questions towards answers or conclusions to these questions (Merriam, 1998; Patton, 2002; Daniels, 2006). Durrheim (2006, p.147) adds that the design of a study involves “multiple decisions about the way in which the data will be collected and analysed in order to ensure that the final report answers the initial research question”. A research design therefore implies a plan of action that is developed by making decisions about four dimensions of the research: these are the research paradigm, the purpose of the study, the techniques to be used, and the situation within which observation will take place (Durrheim, 2006).

Soundness of fit between the four dimensions of the research design is essential in order for the researcher to answer the proposed research questions, and also to reach a credible and plausible conclusion after the collection and interpretation of the data (Henning et al., 2004).

Within these frameworks, the research was planned as a case study of a group of adolescents, focusing on their experiences while participating in a djembe drumming group, trying to gain an understanding of these experiences, and further how these experiences influenced or supported them in their learning.

### **3.4.1 Case study**

A case study is a method of research that is defined by an interest in an individual case which highlights the question of what can be learned from the case (Stake, 2005). Merriam (2009) describes a case study as an in-depth description and analysis of a bounded system. A case study is therefore a process of conducting an inquiry into the bounded system or unit of analysis selected for the study, or the product of a case investigation (Merriam, 2009). The case in this study therefore consisted of an identified group of adolescents who took part in a djembe drumming group for certain period of time.

A case study affords the researcher the opportunity to optimise his or her understanding of the case under investigation, by pursuing scholarly research questions and also further by thoroughly triangulating these descriptions and interpretations (Stake, 2005). Yin (2012) describes a case study as the desire to derive an in-depth understanding of a single or small number of cases, set in real-world contexts. A prolonged and in-depth engagement with the participants allows for such a study. The case selected for this research investigation was decided on because the researcher became interested in the personal and in-depth experiences of a group of Grade 9 adolescents who participated in a djembe drumming group, and how these experiences may have influenced their learning.

### **3.4.2 Context of research process, and researcher's own view**

It is essential, when conducting a qualitative investigation, that the context or natural setting in which the participants function is explored (Cohen et al., 2000). The researcher thus attempted to define, interpret and conceptualise the research context, to augment a total understanding of the phenomenon (Terre Blanche, Kelly & Durrheim, 2006). The researcher considered the historical, social and environmental factors within the context (Patton, 2002).

The research data for this investigation was collected at a high school situated on the periphery of a town in a semi-urban region in the Western Cape province of South Africa. This school is located in a previously disadvantaged area, and learners at the school live in mostly poverty-stricken environments. The djembe drumming sessions were conducted in

the music class of the school, which is located in a quieter and more secluded part of the school. The decision to conduct the sessions in this class was taken in order not to disrupt the other classes in the school, since the drumming sessions took place during school time as part of the learners' arts and culture learning area.

The context for the research can be enhanced by a discussion of the researcher's own worldview. The researcher's own assumptions form the platform of her 'meaning-making' of the data (Henning, 2004). Henning describes meanings as the cognitive categories that shape a person's view of reality and within which actions are defined.

As indicated in Chapter 1, the researcher, after witnessing the effect of music on young children and adolescents while formally tutoring music, became interested in the way in which adolescents experienced participation in a music group. The researcher taught music in various contexts and settings, and the realisation that music could affect a person to such a degree that it extended into other areas of the individual's life, such as social and cognitive functioning, inspired further investigation into the matter.

During research at a secondary school, the researcher became acutely conscious of the differences between herself and the participants. Her education, privileged background, and current position as a researcher in a school in comparison to the participants' less fortunate background and education created a barrier between them. She was aware of the fact that the participants may respond in ways that they thought she wanted to hear, in order to please her. From session two onwards the researcher purposefully dressed in simpler clothes, wore fewer accessories and applied fewer cosmetics.

Research has shown that an effective music programme can promote emotional well-being, learning aptitude, memory and recall, stress reduction and positive social interaction (Nocker-Ribaupierre & Wölfel, 2010). Consequently, positive research into this area as well as personal experience prompted the researcher to investigate this phenomenon further.

### **3.5 RESEARCH METHODS**

The research methods were chosen as they could be applied and used within an interpretative, qualitative approach. The research design, or plan of action, included all methods used for the research. The techniques applied for this research study were divided into selection of participants, data collection and analysis.

#### **3.5.1 Selection of participants**

The process of selecting research participants, or sampling, can have a significant impact on the outcome of the investigation (Merriam, 2009). Durrheim (2006) outlines sampling as a process whereby research participants are selected from an entire population, and this process involves decisions about which people, settings, events, behaviours, and social pressures to observe.

The size of the sample in qualitative research, guided by an interpretive approach, is usually small as the researcher pays attention to the 'richness' or depth of the information to be collected rather than the quantity (Durrheim, 2006). Merriam (2009) is of the opinion that, during a qualitative investigation, both the sampling size and the sampling criteria are subject to change and that these changes may reflect possible changes in the research context, the time available, the resources, and the participants' willingness to take part. It is also important to select a sample from which the most can be learned – information-rich cases are organised by issues of central importance to the purpose of the study.

The unit of analysis for this research study was 14 adolescents, between the ages of 15 and 17, attending a previously disadvantaged mainstream high school. The research process was explained to a Grade 9 class in the school during an information session. The adolescents could indicate, of their own free will, whether they were interested in taking part in the study, after the researcher had explained the following to them:

- The aim of the research
- The duration of the drum sessions – eight sessions of 60 minutes each, during their arts and culture period
- The eight sessions took place in quick succession over a two-week period, in order to intensify the experience for the participants

Eventually 14 learners indicated their willingness to take part in the research study and informed consent was obtained from them, their parents and relevant teachers (Addenda D, E and G). The case study was thus purposive and convenient (the particular school was within easy reach, the principal and participants gave their consent, and all complied with the criteria set out by the researcher). The criteria for participating were thus met: participants were to be Grade 9 learners from a high school selected for the study; they were to be male or female; and they were to volunteer their participation in the research investigation after being informed by the researcher about the aim of the study and what their participation would entail.

### **3.5.2 Methods of collection and analysis**

Durrheim (2006), and Denzin and Lincoln (2011) agree that, when using qualitative methods of data collection, focus group interviews and observations are included. These methods are favoured by researchers working in the interpretive paradigms, as they offer in-depth insight into the meaning of the lives of participating individuals.

The data for this research were gathered by making use of a number of techniques. Observations were made of the participants during the drumming sessions, by recording the sessions on a video camera. A semi-structured interview was conducted with all the participating learners in the form of a focus group after each session, as well as a focus group after a period of six months had elapsed. Direct feedback by the participants during the sessions, as captured in the video recordings, was considered as part of the data. Finally personal journal entries by each participant were also used to gain in-depth insight into their experiences of taking part in the djembe group. The specific methods of data collection and the procedures that were employed are discussed below.

### 3.5.2.1 *Procedures*

The following procedures were undertaken by the researcher to ensure that the research could take place. Permission to conduct a study in a Western Cape Education Department (WCED) school was applied for, and granted by the WCED Research Directorate (Addendum B). Then, permission to conduct a study in the school itself was applied for, by approaching the principal of the school. Permission was granted by the principal (Addendum C). Thereafter the researcher applied for ethical clearance from the Research in Ethics Committee (REC) of Stellenbosch University. The REC granted permission to conduct the study (Addendum A).

The researcher met with the participants, before the first drum session started and explained the research process to them, what would be expected of them, and what they could expect from the researcher. In addition, the consent forms were discussed with the participants and their parents, in depth, and consequently completed. Copies of the consent forms are attached as Addenda D and E. Lastly, arrangements were made for the time and place of the first drum session that would take place.

### 3.5.2.2 *Data Collection*

The different forms of data collection will be discussed below.

#### 3.5.2.2.1 *Observations*

Angrosino and Rosenberg (2011) describe qualitative researchers as observers of human activities and the physical settings in which these activities take place. Observation implies the use of all the senses in absorbing all sources of information, by paying attention and watching cautiously (Neuman, 2003).

Visual inquiry is defined not only as the study of an image, but more specifically as the study of that which is seen and observable (Emmison & Silverman, 2004). Gravetter and Forzano (2003) state that the observation of participants in a setting arranged specifically for observing and recording behaviour is known as structured observation. The uniqueness of each participant's behaviour in the group setting requires an inquiring, flexible approach to the observations, rather than structured observation. Daniels (2006) is of the opinion that visual-based data is comparable to observations in that they are both inherently ambiguous

with meaning negotiated through the perception of the viewer. Meaning is consequently contained within the image itself. Seen from an eco-systemic perspective, within an educational psychology context, the viewer's observations of the recorded drum sessions as visual data is influenced by inter- and intrapersonal factors, as well as the sociocultural contexts, which include the family, school and community of which the viewer is part. The observations which the researcher transcribed verbatim, included drum sounds, conversations between the researcher and participants, body language, and body movements of the participants.

#### *3.5.2.2.2 Focus group interviews*

According to Kelly (2006) and Merriam (2009), focus group interviews allow participants to express their experiences through social interaction. The participants are invited to share their understanding of a phenomenon while interacting with others who have shared a similar experience, inspiring them to 're-shape' their subjective perceptions (Kelly, 2006).

In this type of interview the researcher's attention is primarily focused on the interaction established between the participants and the dialogue which surfaces from this interaction (Rule & John, 2011). A variety of viewpoints around the same phenomenon emerges from this, and can be obtained in a relatively short period of time (Patton, 2002; Babbie & Mouton, 2010). The quality of the focus group data depends on two primary factors: sound preparation and effective moderation of the group discussion (Wilkinson, as cited in Silverman, 2004).

The role of the researcher as moderator in the focus group interview as part of this study was to keep the discussion flowing and enable all group members to participate fully. The aim furthermore was to draw attention to formerly neglected or unnoticed phenomena with the aim of discovering unexpected insights.

Two focus group sessions of 30 minutes each were conducted for this study, one at the conclusion of the sessions, and another six months thereafter. The group consisted of 14 adolescents, nine females and six males. The researcher followed a semi-structured format, which allowed her to guide the session as the participants engaged in spontaneous discussion with each other on their experiences. The focus group interviews were recorded

on a digital camera, with the permission of the participants. Addenda H and I contain the respective focus group interview guides used for this study.

#### 3.5.2.2.3 *Diary entries*

The day-to-day diary entries of the participants gave the researcher a deeper understanding of their experiences over time. The aim of this research was to gain an understanding of the adolescents' levels of self-esteem, and therefore their own reflections on their environments were considered useful. The participants were asked to keep a diary of their daily experiences, and the researcher offered opportunities for them to reflect on their experiences in their diaries, before and after each of the eight sessions.

Silverman (2013) notes that diary entries can be a rich source of data, as they give detail about how people make sense of their daily lives. In diaries individuals can freely express their personal feelings, opinions and understandings (Berg, 2007). There are also other advantages of diary entries, such as assisting with exact restatements and details of occurrences. They also provide information about the writer as well as others who interact with him/her, and, lastly, diaries provide an opportunity for the writer to reflectively recreate the events (Berg, 2007).

#### 3.5.2.3 *Data analysis*

Wilkinson (2004) describes data analysis as an all-inclusive process typically addressing in abundant analytical depth the issue of "what is going on" between the participants in detailed segments of the data. The researcher should, when analysing, consider the words, the context, the internal consistency, frequency and extensiveness of the comments, and also what was not said, as well as finding the "big idea" (Morgan, Krueger & Casey, as cited in De Vos, 2002). The data analysis chosen should further match the relevant research paradigm, and answer the research question (Durrheim, 2006). This research study was conducted within the interpretative, qualitative paradigm, and therefore qualitative data analysis would best fit with this study.

During the process of qualitative data analysis, a classification or coding scheme is developed by identifying themes in the data (Durrheim, 2006; Patton, 2005) and coding them. Codes can be described as "tags or labels for assigning units of meaning to the descriptive or inferential information compiled during a study" (Miles & Huberman, 1994, p.

94). The data is then broken down, examined, compared and conceptualised, and then reconstructed in a new way by classifying the data (Strauss & Corbin, 1990). Strauss and Corbin (1990) point out that open coding differs from coding in the sense that open coding relates directly to the conceptualisation and classification of the data. Open coding was employed in this study.

The following paragraphs describes the process of data analysis. The data was organised and prepared for analysis. This involved the transcription of audio-visual recorded data obtained verbatim during the drumming sessions. The typed-up field notes were added to the above-mentioned transcriptions, as well as the journal entries. The collected information was organised into thematic categories correlated to the meanings attached to them in the coding process. The categories were labelled according to specific groups of related codes and topics.

The process to facilitate the coding ensued as follows:

1. The researcher firstly transcribed the audio-visual recorded data verbatim. These sessions included drum sounds, conversations between the researcher and participants, and body movements and body language of the participants. The researcher transcribed the focus group interviews verbatim. Then the researcher applied the procedure of open coding to the learners' journal entries.
2. During the final analysis and sorting of the themes the researcher came to conclusionary categorised findings which are discussed in Chapter 4. Extracts from different documents that contain data gathered, and demonstrating the analysis (coding) process are attached as Addendum N and O.

### **3.6 DATA VERIFICATION**

The trustworthiness of the knowledge resulting from the research data should be ensured by taking the following four concepts into consideration, namely credibility, transferability, dependability and confirmability (Babbie & Mouton, 2001). A discussion of these concepts ensue, including the actions taken to ensure that high standards of practice were followed.

### **3.6.1 Credibility**

Credibility refers to the degree of accuracy of the research data collected (Babbie & Mouton, 2010). In order to escalate the credibility of this investigation, the researcher made use of triangulation, as well as member checking.

As similarities are perceived across the results of the various research methods, the credibility of the findings increases (Patton, 2002). In this research study, observation, two focus group interviews, diary entries of the participants, and reflective notes of the researcher were used to obtain the participants' perceptions of their experiences of taking part in a drum group. In combination, these served as a basis for triangulation.

The researcher also made use of member checking by asking the participants to review the data that had been collected, including the interpretations of the researcher (Babbie & Mouton, 2010).

### **3.6.2 Dependability**

Dependability refers to the reliability of a research study. Merriam (2009) states that this can be described as the extent to which the outcomes of a research investigation would be similar if the study were to be repeated using similar participants in the same environment (Babbie & Mouton, 2010).

Babbie and Mouton (2001) argue that if the credibility of a research project can be ensured, the conclusion can be drawn that the dependability is also ensured. This research process employed various methods of data collection in an attempt to ensure that the researcher could capture a wide range of the adolescents' experiences, making the study more dependable. The researcher continually tried to stay as objective as possible in the interpretation of the research findings.

### **3.6.3. Transferability**

The contextual nature of qualitative research limits the generalisability of the findings and the extent to which these can be transferred to other contexts or other participants (Babbie & Mouton, 2010; Kelly, 2006). Transferability relates to the extent to which it is possible to generalise from the data and context of the research study to broader populations and settings (Van der Riet & Durrheim, 2006).

In an attempt to transfer the findings of this research investigation, and apply it to bring about understanding and meaning-making in other contexts, the researcher attempted to compile a rich description of the findings in Chapter 4. Further purposive sampling with clear criteria was used.

#### **3.6.4 Confirmability**

Babbie and Mouton (2010) describe confirmability as the extent to which the outcomes of a research investigation reflect the content of the data obtained, and not the predetermined notions of the researcher. The researcher should always be aware of personal bias and actively work towards reducing the influence this may have on the findings of the study (Henning et al., 2004). The pertinent question here is, “Do the conclusions depend on ‘the subjects and conditions of the inquiry’, rather than on the enquirer?” (Miles & Huberman, 1994).

The researcher deliberately included reflective notes during the process, and as part of this reflection, provided declarations about her own position on the topic. She aimed to provide an audit trail of her own awareness in terms of the subjective nature of qualitative research and the possible influence this could have on the findings of the study.

### **3.7 ETHICAL CONSIDERATIONS**

All aspects of contemporary social research involves matters of ethical practice. Miller, Mauthner, Birch and Jessop (2012) are of the opinion that ethical decisions arise throughout the entire research process, from conceptualisation to design, data gathering and analysis.

#### **3.7.1 Ethical clearance**

Allen (2008) refers to the psychological principles of beneficence and non-maleficence, which reflects the desire to do good and no harm. The researcher, aware of the moral imperative to cause no harm, applied for ethical clearance prior to the undertaking of the present research study. Permission to continue was allowed by the Research Ethics Committee of Human Research of Stellenbosch University (Addendum A).

### **3.7.2 Informed consent**

As the research participants were aged under 18, they were not legally able to give consent. Consent forms were completed by the parents (Addendum E), as well as by the participants (Addendum D). The aims and particulars of the research study were stipulated in detail in the forms. The concept of informed consent was discussed and explained to the participants and their parents, and the participants were encouraged to ask questions in an effort to shed light on anything that was unclear to them.

### **3.7.3 Confidentiality**

The researcher discussed the aspect of confidentiality with the research participants; and the steps that were taken to ensure confidentiality, and which were explained in the consent forms, were also clarified with the participants and their parents. The participants' anonymity was further ensured by making use of pseudonyms in this research report, and by not including any identifying details of the school or area where the school is situated. Data on the researcher's computer were protected by a secure password, and physical data was kept in a locked safe and were only seen by the researcher and supervisor of the study.

## **3.8 SUMMARY**

This chapter provided an overview of the paradigm, design and methods used in this research study. The data verification strategies that were used, as well as the ethical considerations, were presented and discussed. Chapter 4 provides a presentation and discussion of the research findings.

## CHAPTER 4

### RESEARCH FINDINGS AND DISCUSSION

#### INTRODUCTION

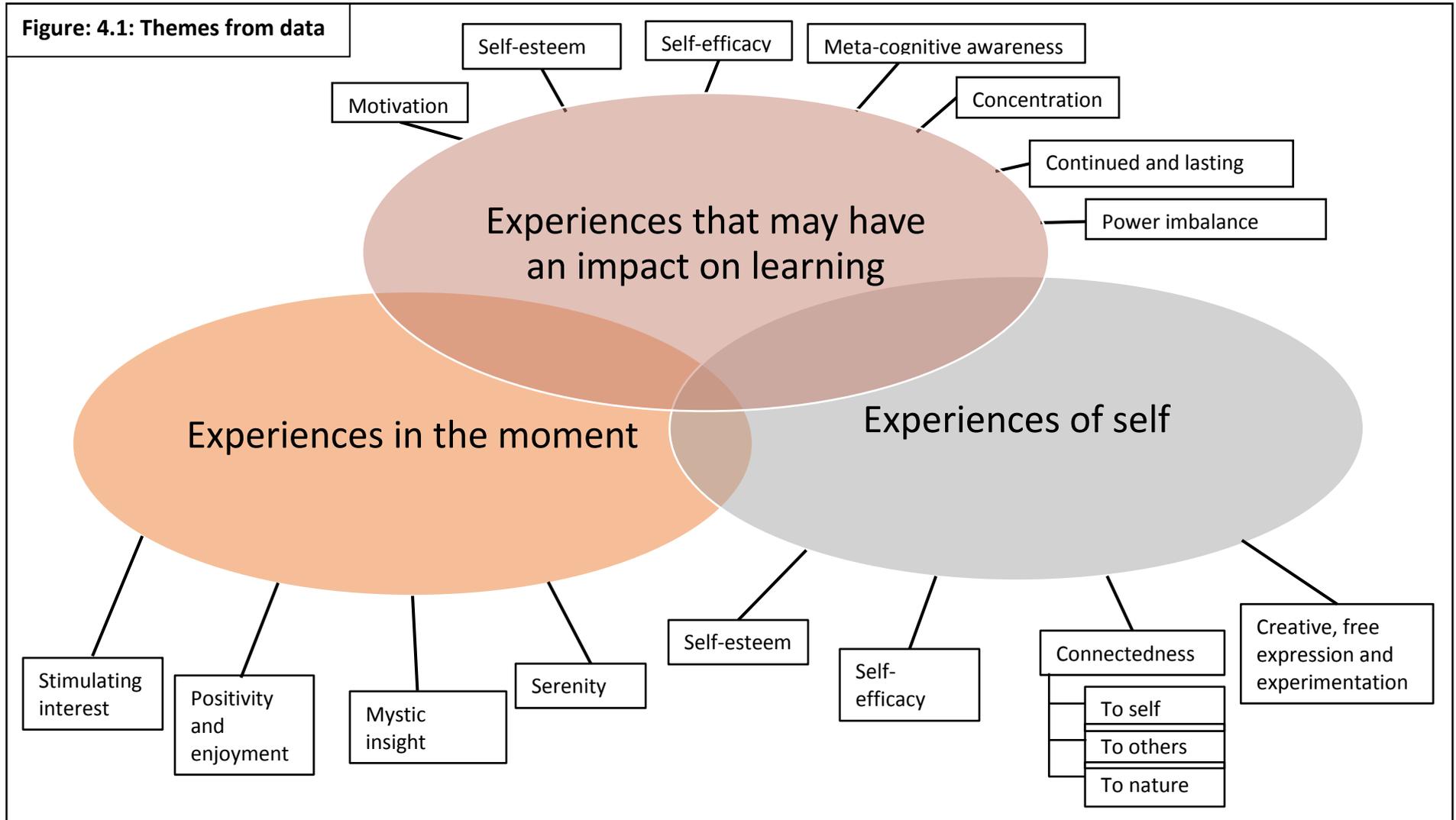
The findings of the research will now be presented and discussed according to the various themes and categories which emerged during the qualitative data analysis. The themes reflect the experiences of adolescents who participated in a djembe drumming group. The data which is presented was collected using various methods, namely observations, documents, individual and focus group interviews, documents and journal entries.

The process of gathering the data was guided by the research question, *How does djembe drumming facilitate learning?* In addition, the secondary research questions that further guided the process were:

*What are the experiences of participating adolescents of taking part in a drumming group?*

*What specific experiences of participating adolescents can contribute to general improvement in their learning?*

*How do the participant adolescents link the drumming activity with learning?*



## **4.1 PRESENTATION OF THE DATA**

Various themes emerged from analysing the data emanating from the different data sources are presented in Figure 4.1. When the findings are presented it is indicated by the various headings which will follow below.

### **4.1.1 Research context and biographical information of the participants**

As indicated in Chapter 1, Section 1.6.1, the research data for this investigation was carried out at a high school situated on the periphery of a town in a semi-urban region in the Western Cape province of South Africa. This school is located in a previously disadvantaged area, and learners at the school live in mostly poverty-stricken environments. The djembe drumming sessions were conducted in the music classroom of the school, which is located in a quieter and more secluded part of the school. The decision to conduct the sessions in this classroom was taken in order not to disrupt the other classes in the school, since the drumming sessions took place during school time as part of the learners' arts and culture learning area.

A Grade 9 class was approached, the research project was explained, and learners from the class were invited to volunteer to participate. The process of the group drumming circle was presented to them, and 14 learners volunteered to take part in the research project.

The research data was gathered at the school, using observations by recording the sessions on a video camera, focus group interviews, and diary entries of participants. Confidentiality was ensured throughout the process – the video recordings were transcribed by the researcher and only the supervisor was privy to the transcriptions and the diaries entries of the participants. The biographical information of the participants, as well as the data collection techniques used, are provided below in Table 4.2.

Eight djembe drumming sessions were presented over two weeks for a time period of one hour each. The initial planning of the research investigation stipulated that the research would be carried out over a period of eight weeks, during a one-hour session each week. This planning had to be adjusted owing to practical considerations. However, the intensity of the experiences were heightened with the increased frequency of the sessions. The

headmaster informed the researcher that the school was to close two weeks before the September school holiday, which meant a rescheduling of drumming sessions was required. A shift of the originally planned weekly sessions over eight weeks to a slot after the school holiday would however also be problematic for the school. These alterations forced the researcher to conduct the eight sessions in a two-week period. The sessions included djembe drum playing, and various movement and team activities (Addendum J). The sessions, as presented to the participants, are briefly described in Section 4.1.2.

**Table 4.1: Biographical details of participants**

Research participant code	Gender	Age	Ethnicity	Home language	Data collection techniques			
					Observations	Focusgroup interview 1	Focusgroup interview 2	Diaries
P1	Female	15	Coloured	Afrikaans	✓	✓	✓	✓
P2	Female	14	Coloured	Afrikaans	✓	✓	✓	✓
P3	Female	14	Coloured	Afrikaans	✓	✓	✓	✓
P4	Male	14	Coloured	Afrikaans	✓	✓	✓	✓
P5	Female	15	Coloured	Afrikaans	✓	✓	✓	✓
P6	Female	14	Coloured	Afrikaans	✓	✓	✓	✓
P7	Male	14	Coloured	Afrikaans	✓	✓	✓	✓
P8	Male	15	Coloured	Afrikaans	✓	✓	✓	✓
P9	Female	15	Xhosa	Xhosa	✓	✓	✓	✓
P10	Female	14	Coloured	Afrikaans	✓	✓	✓	✓
P11	Male	16	Coloured	Afrikaans	✓	✓	✓	✓
P12	Male	16	Xhosa	Xhosa	✓	✓	✓	✓
P13	Female	15	Coloured	Afrikaans	✓	✓	✓	✓
P14	Female	14	Xhosa	Xhosa	✓	✓	✓	✓

#### 4.1.2 Drumming sessions

Eight drumming sessions were presented to the participants. The sessions each had various sections, of which all started with the same introduction, and ended with the same conclusion. The researcher facilitated the introduction comprising a drumming sequence which represented the group escaping to an imaginary village, where the drum session took place. The ‘escape’ was facilitated through playing on the djembe drums, in varying tempos, and volume. The conclusion was facilitated in such a way as to represent the participants returning to the school, again through djembe drumming, similar to the introduction. The activities in each session varied. Examples of activities in these sessions included creating a thunderstorm, free rumbling on the djembe drums, creating a web of positivity, playing participants’ names on the djembe drums, and creating a composition by combining all participants’ names. Activities progressively became more complicated towards session eight, as more complicated drumming techniques were introduced throughout the sessions.

The findings which will now be presented are fully discussed later in Chapter 5. These findings are interpreted according to the research questions and in light of Bronferbrenner and Bandura’s theories, as summarised in Chapter 2. The presentation of the findings below include excerpts from all of the various forms of data as evidence for the respective categories and themes. For the sake of convenience, a key is used in order to indicate where the data comes from. This key is displayed in Table 4.2 below.

**Table 4.2: Key for data collection method**

<b>Key</b>	<b>Source of data</b>
Obs ses 1/2/3/4/5/6/7/8	Observations Sessions 1–8
Dia	Diary entries
Ref	Researcher’s reflective notes Session 1–8
FGI1/2	Focus group interview 1 or 2

The analysis of the data yielded the following categories with various themes constituting the three different categories. The themes that emerged were categorised as *Participants' experiences with djembe drumming that may have an impact on learning; Participants' experiences in the moment and Specific experiences of participants in relation to self*. The themes will now be presented and supported by extracts from the data.

Those aspects which emerged most frequently during the analysis of the researcher's observations, participant's comments, drumming sessions recordings, journal entries, and focus group interviews were coded accordingly. Data was recorded in participants' first language, Afrikaans, and for the data presentation and discussion, the verbatim responses were translated into English.

## **4.2 CATEGORIES AND THEMES FROM THE DATA**

### **4.2.1 Participants' experiences with djembe drumming that may have an impact on learning**

The researcher identified eight themes that constitute those experiences of the participants that may have an impact on their learning. The themes which contributed to this category were motivation, self-esteem, self-efficacy, meta-cognitive awareness, concentration, continued/lasting effect, marks improvement, and creative/free expression. The researcher accepts that many of these reflections and observations may have been the product of participation by the participants in an activity that is novel and exciting. The researcher was further aware of the fact that there were many differences between the researcher and the participants, of which power was one of the most prominent. Therefore, many of the participants' responses may have been offered to please the researcher, and not necessarily as an authentic experience.

Other factors, such as noise in the school building, changes in the set time of the sessions, and a general restless atmosphere in the school may also have contributed to inaccurate data findings. The researcher includes an excerpt from observation 3 to validate this statement:

*“The children were very restless as most of the other children at school were playing outside or moving around in the corridors.” (Obs – session 3)*

#### 4.2.1.1 Motivation

As previously mentioned, the researcher recognises that drumming sessions were a completely novel and foreign experience to the participants. Therefore it is not surprising that the participants did not appear to be very motivated in the initial drumming sessions. As the sessions progressed, and the group realised that drumming was not as intimidating as they had anticipated, they seemed to become more motivated, in that they responded to challenges with interesting rhythmic responses, or body movements, or continued for a longer period with a more complicated exercise which they had initially found difficult.

One participant reflected that she enjoyed challenges, and another participant indicated that she felt inspired. The researcher coded these two reflections under motivation as well.

*... he extended the first syllable of his name from a crotchet to a minim. I prompted him to alter the rhythm even more ... he replied with an additional rhythmic change. He also added a small hand movement. (Obs – session 2)*

*After approximately 10 attempts the group managed to grasp the idea, and started to move together ... the group continued with this exercise for at least 10 minutes, and seemed to enjoy it as they grasped it. (Obs – session 5)*

*They practised this a few times and seemed to enjoy it, they looked attentively at their drums, they smiled and played well together as a group. (Obs – session 7)*

*... ek hou daarvan om uitdagings te kry. (P6: Dia) [I like to be given challenges]*

*... en ek voe inspireerind. (P5: Dia) [I feel inspired.]*

#### 4.2.1.2 Self-esteem

It became clear from the first drumming session and as the sessions developed that the self-esteem of the participants seemed initially to be low, but increased gradually as the sessions progressed. An increase in the levels of self-esteem of the participants was noted in the observations of their body language during the drumming sessions. During the first session their body language was uncertain and 'closed' (arms crossed, legs crossed, very little eye contact).

*The participants took their places on the benches uncertainly, and moved around restlessly. Most of them crossed their arms in front of their bodies, and avoided eye contact with me."* (Ref: session 1).

*They looked around uncertainly, and eventually wrote tentatively in the journals.* (Obs – session 1)

*They did not use their bodies much in the playing of the djembes, sitting fairly rigid ...* (Obs – session 1)

*Her body language was slightly uncertain and her voice was soft and unclear ...* (Obs – session 2)

*He leaned slightly forward with his body and looked uncertain ...* (Obs – session 2)

*...repeated the previous rhythm ..., but added a body movement, crossing his hands in front of his body while he said his name ...* (Obs – session 2)

*The next member walked forward while clenching her fists; she looked very nervous, and introduced herself ..."* (Obs – session 2)

*The next member looked very nervous, she clutched her dress hem crossed her legs and pulled at her dress while saying her name.* (Obs – session 2)

*...the last member did not want to stand up and said, 'Ek kannie my naam maak nie* (Obs – session 2)

*...she looked around and seemed uncertain, and said, 'Ek weet nie. (Obs – session 3)*

*...he laughed and looked away, embarrassed. (Obs – session 4)*

It was evident as the sessions progressed that the body language of the participants changed. The body language became more relaxed and open (more eye contact was made, arms and legs were no longer crossed in front of body). Furthermore, positive emotions such as smiling and laughing became apparent in the observations of session 7. An increase in self-esteem further became apparent when the participants took part in activities more actively, and introduced creative, innovative ideas of their own.

*During the activities certain participants showed initiative by introducing innovative body movements as part of a specific game. (Obs – session 2)*

*The next participant introduced himself, and repeated the rhythm that the previous participant had used, but added an interesting body movement to the rhythm. (Obs – session 2)*

*The fifth participant introduced herself to the group, and used an interesting, creative body movement with her name. (Obs – session 2)*

*I asked the participant sitting on my right to start with the first statement, and he replied verbally, 'Ek is nuut ...' (Obs – session 4)*

*They enjoyed this activity as well; they were very quiet during the activity and laughed afterwards ... (Obs – session 5)*

*I invited any member of the group to lead this activity and one volunteered. (Obs – session 5)*

*"It was clear that the participant whose movements were echoed by the group was enjoying the responses to his movements, as he smiled broadly each time the group responded accurately to one of his movements. Afterwards the group clapped hands spontaneously." (Obs – session 7).*

*Die drom speelikie het my baie gehelp met konsentrasie en om te fokus op selfvertroue.*  
(P11: Dia) [The drum game helped me a lot with concentration and to focus on self-confidence.]

#### 4.2.1.3 *Self-efficacy*

The responses from the participants indicated a confidence in their capacity as learners. Their answers reflected a meta-cognitive awareness, but also a belief in their own capabilities to learn and to study. Two participants offered descriptions of learning strategies, and observations from sessions and illustrated a sureness in their capacity, as they ventured further, to experiment with a variety of rhythms.

*... om iets te vertel in 'n storie is iets wat ek nooit an gedink het nie ek sal dit graag meer wil doen want ek virstaan dit beter so.* (P11: Dia) [... to tell something in a story is something that I have never thought of and I would like to do it more because I understand it better this way.]

*Uhm, as mens die drums kap ... dan voel jy mos die ritme ... en as ek leer, dan dink ek daaraan, die ritme, dan onthou ek beter, dan sê ek die werk op die ritme, dan onthou ek beter.* (P10: FIG2) [Uhm, if you hit the drums ... then, you know, you feel the rhythm ... and if I study then I think about it, the rhythm, and then I remember better, then I say the work to the rhythm, then I remember better.]

*They could free rumble together while saying the affirmations together. They continued with the free rumbling session for approximately 10 minutes, and experimented with different rhythms.* (Obs – session 5)

*At the end of the session I allowed free rumble time on their drums, it was clear that at least five participants experimented with interesting rhythms, as well as different playing techniques.* (Obs – session 7)

#### 4.2.1.4 *Meta-cognitive awareness*

An awareness of specific activities or techniques that could assist participants with their academic tasks emerged. Thus an insight into their own way of learning or understanding

emerged. Participants indicated that they understood the techniques they had been introduced to during the drumming sessions, such as linking facts together in a story form, or telling a story in a specific rhythmic pattern, and that these were techniques which they could use just as effectively as study techniques.

*Ek het aan die navorsingstaak gedink en hoe dit my laat voel. (P7: Dia) [I thought about the research task and how it makes me feel.]*

*... om iets te vertel in 'n stoorie is iets wat ek nooit an gedink het nie ek sal dit graag meer wil doen want ek virstaan dit beter so. (P11: Dia) [... to tell something in a story is something that I have never thought of and I would like to do it more because I understand it better this way.]*

*Uhm, as mens die drums kap ... dan voel jy mos die ritme ... en as ek leer, dan dink ek daaraan, die ritme, dan onthou ek beter, dan sê ek die werk op die ritme, dan onthou ek beter. (P10: FIG2) [Uhm, if you hit the drums ... then, you know, you feel the rhythm ... and if I study then I think about it, the rhythm, and then I remember better, then I say the work to the rhythm, then I remember better.]*

*... die drom speelkie het my baie gehelp met konsentrasie. (P11: D) [...the drum game helped me a lot with concentration.]*

#### 4.2.1.5 Concentration

The observations of the researcher indicated that concentration and focus were reflected on the faces and in the body language of the participants. The researcher noted that the silence in the group was another indication of concentration and focus. The observations further showed that a participant listened attentively to the rhythm which he/she had created, in an attempt to determine whether the rhythm was correct. In the journal entries participants indicated that they found they had more “brein energie” [brain energy] when they created music. This could be loosely translated as energy for learning, or concentration became possible when they created music.

Participants further indicated that the drum activities had helped them to concentrate and focus, with an increase in self-confidence.

*They played together very accurately and the expressions on their faces showed concentration and focus. (Obs – session 1)*

*They thoroughly enjoyed the playing as they smiled and concentrated on their drums. (Obs – session 3)*

*The next participant played a complicated rhythm, but the group's body language reflected intent concentration and focus, and they reflected the rhythm accurately. (Obs – session 4)*

*It was clear that there was a sense of focus and concentration in the group, which was not present previously. (Obs – session 4)*

*We started the exercise for the fourth time, there was complete silence, and only one sound was heard from all the shakers; it was clear that all the participants were concentrating and focusing their attention to achieve one sound. The focused concentration lasted for approximately 30 seconds ... (Obs – session 5)*

*This exercise continued for approximately three minutes and the participants looked as if they were concentrating on the end product. (Obs – session 5)*

*The participant who had said the rhythmic word listened attentively to the drummer while the rhythm was played back to him by the group. Afterwards he nodded and smiled when he heard that the rhythm had been repeated accurately. (Obs – session 6)*

*So jy meer musiek maak kry jy meer brein energie. (P9: Dia) [As you make more music you get more brain energy.]*

*... die drom speelkie het my baie gehelp met konsentrasie en om te fokus op selfvertroue. (P11: D) [... the drum game helped me a lot with concentration and to focus on self-confidence.]*

*... jy moet fokus, ook konsentrasie. (P6: D) [... you have to focus, also concentration.]*

#### 4.2.1.6 *Continued and lasting effect*

An unexpected theme which emerged was the fact that the participants indicated that they anticipated that they would like to continue with the sessions in future. One participant indicated that he/she continued to feel and hear the rhythm after the sessions had ended.

*... ek het nog steeds die ritme gevoel en gehoor in my kop. (P4: Dia) [... I still felt the rhythm and heard it in my head.]*

*... ek sal laaik om weer te kom na die sessie. (P7: Dia) [... I would like to come to the session again.]*

*... ek het baie van die drom gespeel en ek hou baie daar van en ek sal laaik om weer te speel. (P7: Dia) [... I played a lot of the drum and I like it a lot and I would like to play again.]*

*... wanneer gat ons weer begin? (P10: FIG2) [... when are we going to start again?]*

#### 4.2.1.7 *Power imbalance*

An additional unexpected theme which emerged was an observed power imbalance between the researcher and the participants. The researcher became aware of this imbalance, and noted it in her reflective diary, and it was further observed in the sessions with the participants. The researcher experienced the power imbalance acutely as she conducted focus group interview 2, after a couple of months had passed since the intervention, and there was an obvious imbalance between the participants and herself.

*...there was indeed a feeling of uncertainty – maybe uneasiness – with me? A power imbalance? (Ref – session 1)*

*...The group seemed more at ease with me. There were 2 girls that still seemed uncomfortable, and did not fully participate in the activities. They did not make eye contact with me, they also separated themselves from group activities by not participating fully. (Ref – session 2)*

*...She played...rhythm, very softly. I asked her to repeat it a bit louder, she repeated it, but not much louder, and I asked her to repeat it again. (Obs – session 1)*

*...They did not use their bodies much in the playing of the djembes, sitting fairly rigid, however as the exercise progressed and when the drumming became louder...they moved around more...(Obs – session 1)*

*...Rustig...ja...nog iets? (ongeveer 2 minute se stilte verloop) (FGI 2) [Calm...yes..anything more? (approximately 2 minutes of silence passes)]*

*Enige iemand anders wat ook so iets uitgewerk het, of iets anders miskien, wat julle uitgevind het die dromgroepie jou laat aan dink? (Stilte) (FGI 2) [Anyone else that also worked something like this out, or something else perhaps, that you found out that the drumgroup made you think of? (Silence)]*

*Het iemand miskien na die dromgroepie gedink, sjoe, ek is eintlik orait? Iemand dit gevoel? (Stilte). (FGI 2). [Did someone perhaps think after the drumgroup, wow, I am actually ok? Anyone felt that? (Silence)]*

#### 4.2.1.8 *Creative and free expression*

It should be taken into consideration that the participants who participated in this research investigation may not have had a chance previously to explore their own creativity freely. The researcher noted in her reflective notes (Addendum P) that the participants did not engage in opportunities to use their own creativity without difficulty. The researcher had to give examples, and offer to play with them initially. However, over time, participants offered their own rhythmic creations, as a group they joined in 'jamming' sessions, and one participant indicated that he/she felt that he/she could express feelings.

*There was a technical problem with the CD, and I continued to play on my drum without music; they followed me spontaneously. This resulted in a 'free' jamming session where the group and I spontaneously moved between various rhythms. (Obs – session 1)... he looked at me for a few seconds, and then played a very interesting complicated rhythm on his drum (ta-e-fe-ta-e-fe-ta-e-fe). (Obs – session 4)*

*The next participant played a relatively simple rhythm ... but introduced a drumming technique where both hands moved gradually to the middle of the drum, while playing. The group concentrated and focused, and had some difficulty in repeating the rhythm and technique accurately, but succeeded after the third attempt. (Obs – session 4)*

*I gave the group the opportunity to end with a free rumble session while they chanted the affirmation, 'We all stand together'. The group experimented with various rhythms, and moved their upper bodies while playing. (Obs – session 8).*

*... omdat ek my gevoelens kan express. (P2: Dia) [... because I can express my feelings.]*

*At the end of the session I allowed free rumble time on their drums, it was clear that at least five participants experimented with interesting rhythms, as well as different playing techniques. (Obs – session 7)*

*During the activities certain participants showed initiative by introducing innovative body movements as part of a specific game. (Obs – session 2)*

*The next participant introduced himself, and repeated the rhythm that the previous participant had used, but added an interesting body movement to the rhythm. (Obs – session 2)*

*The fifth participant introduced herself to the group, and used an interesting, creative body movement with her name. (Obs – session 2)*

*... as the exercise was freely structured, it allowed room for experimentation and free play; they played on, laughed, and moved their bodies as they played. (Obs – session 7)*

#### **4.2.2 Participants' experiences in the moment**

This theme, participants' experiences in the moment, describes the experiences as the participants were experiencing them at that moment, during the sessions. The themes which emerged were: stimulating interest, positivity/enjoyment, mystic insight, and serenity.

#### 4.2.2.1 *Stimulating interest*

Participants described their experiences of the drumming sessions as interesting, and stated that they had learned about music and drums.

... *die musiek is intresand.* (P9: Dia) [... the music is interesting.]

... *dit was baie interesant en ek het baie geleer.* (P14: D) [... it was very interesting and I learnt a lot.]

... *ek het baie van musiek geleer.* (P11: Dia) [... I learnt a lot about music.]

... *ek het weereens baie geleer oor drums.* (P14: Dia) [... once again I learnt a lot about drums.]

#### 4.2.2.2 *Positivity and enjoyment*

The theme of positivity and enjoyment reflected the largest number of responses that corresponded. These responses included participants' journal entries and observations. Many of the participants indicated positive feelings as they participated in the drum group. Participants' experiences further included: feeling alive, feeling excited, feeling better, feeling inspired and enjoying the sound of the drums.

... *lekker laat voel.* (P12: Dia) [... felt good.]

... *ek het fantasties gevoel.* (P6: Dia) [... I felt fantastic.]

... *ek het baie goed gevoel.* (P4: Dia) [... I felt very good.]

... *dit het my lekker laat voel.* (P12: Dia) [... it made me feel good.]... *dit laat my ook lewendig voel.* (P2: Dia) [... it also made me feel alive.]

... *ek voel baie lekker want die musiek het my lekker laat voel.* (P3: Dia) [... I feel very good because the music made me feel good.]

... *dit het my baie gelukkig laat voel.* (P5: FGI2) [... it made me feel very happy.]

... *ek voel excited.* (Obs – session 3) [... I feel excited.]

In other cases, participants remarked that their overall feelings had improved, and that the music had made them feel better, in comparison to an earlier feeling that was not good.

*... ek voel beter, ek voel lekker, dit het my goed laat voel. (P-13: Dia) [... I feel better, I feel good, it made me feel nice.]*

*... voel weer lekker na wat ek gedoen het nadat ek vanoggend sleg gevoel het. (P8: Dia) [... feel better again after what I did after feeling bad this morning.]*

*... die mesiek het my beter en lekker laat voel. (P12: Dia) [... the music made me feel better and good.]*

An observation of the group reflected that the group enjoyed the activity, once they grasped the concept.

*The group continued with this exercise for at least 10 minutes, and seemed to enjoy it, as they grasped the idea. (Obs – session 5)*

Two participants indicated their positivity and motivation in terms of a pleasurable challenge.

*... ek hou daarvan om uitdagings te kry. (P6: Dia) [... I like to be given challenges.]*

*... en ek voel inspireerind. (P5: Dia) [... and I feel inspired.]*

*While participating in the drumming sessions, it was apparent in the body language of the participants that they enjoyed the activity. They were smiling and laughing while they played on the drums. (P1-Obs, P7-Obs, P4-Obs, P7-Obs).*

Comments from the transcripts of the observations further include:

*The participants clearly enjoyed the activity, they smiled and moved around with their upper bodies. (Obs – session 1)*

*They enjoyed this activity as well: they were very quiet during the activity, and laughed afterwards. (Obs – session 5)*

*... as the sound grew louder, they laughed loudly and looked at each other. (Obs – session 7)*

*The movement exercise continued for at least five minutes: the participants laughed, tapped their feet, moved their feet rhythmically from side to side, and clearly enjoyed the exercise. (Obs – session 6) The participants looked at each other, smiled, laughed out loud; some tapped their feet, others moved their upper bodies, and others their heads, from side to side, as the rhythm continued. (Obs – session 7)*

*... as the exercise was freely structured, it allowed room for experimentation and free play, they played on, laughed, and moved their bodies as they played. (Obs – session 7).*

The experiences of the participants, as reflected in their journal entries, included enjoyment in hitting the drums, an interesting experience, excitement, and a request to continue with the sessions.

*... die sessie was amazing. (P2: Dia) [... the session was amazing.]*

*... lekker om te slaan op die dromme, ek geniet dit baie. (P8: Dia) [nice to hit on the drums, I enjoy it a lot.]*

*... ek het die klank van my mesiek geniet. (P12: Dia) [... I enjoyed the sound of my music.]*

*... die sessie was baie lekker, intersant en ek het dit baie geniet. (P13: Dia) [... the session was very nice, interesting, and I enjoyed it a lot.]*

*... ek het dit baie geniet. (P10, P14: Dia) [... I enjoyed it a lot.]*

*... sjoe baie lekker en opwindend, geniet dit baie. (P8: Dia) [... wow, very nice and exciting, enjoyed it a lot.]*

*... ek het nie woorde vir die sessie nie, al wat ek kan sê is fantastic. (P2: Dia) [I don't have words about the session, all that I can say is fantastic.]*

*... dit was fun. (P11: Dia) [... it was fun.]*

*... daar was iets wat in my geborrel het, ek het daarvan gehou.* (P6: Dia) [... there was something that bubbled in me, I liked it]

#### 4.2.2.3 *Mystic insight*

The theme, mystic insight, captured participants' experiences of inspiration and wonder. Their experiences of wonder and awe were revealed in the silence that ensued in the group, after they had created a web of positivity, which included positive attributes which each of them had to say about themselves. One participant described the inspiration that he/she felt as if it were received from God.

*I pointed at the web of positivity and pointed out what a lovely web they had created with positive things that they had said about themselves. A silence fell over the group, as they looked at the patterns and shapes that they had weaved.* (Obs – session 3)

*... dit was soos as almal om 'n vuur sit en een van die Zulu hoofstamme 'n storie vertel.* (P5: D) [... it was as if everyone was sitting around the fire and one of the Zulu main tribes tells a story.]

*... asof ons inspirasie van God gekry het.* (P5- D) [... as if we received inspiration from God]

#### 4.2.2.4 *Serenity*

Experiences of calm and serene wonder were expressed under the theme of serenity. Participants further reflected on their feelings of happiness, freedom and peace.

*The group chanted together well, and a feeling of calmness and serenity was felt.* (Obs – session 4)

*I pointed at the web of positivity and pointed out what a lovely web they had created with positive things that they had said about themselves. A silence fell over the group, as they looked at the patterns and shapes that they had weaved.* (Obs – session 3)

*... ek voel gelukkig en vry.* (P5: D) [... I feel happy and free.]

*... ek voel nou ristag.* (P12: D) [I now feel peaceful.]

*... ek het gedink hoe dit my beter laat voel het as ek ... as ons daar gespeel het ... kalm ... rustig. (P4: F12) [... I thought how it made me feel better if I ... if we played there ... calm ... peaceful.]*

#### **4.2.3 Participants' specific experiences in relation to self**

The themes which emerged were self-esteem, self-efficacy, and connectedness, which was divided into connectedness with self, connectedness to other members of the group, and connectedness with nature.

##### *4.2.3.1 Self-esteem*

The researcher's reflective notes included observations about the uncertain, closed body language, and lack of eye contact of the participants in the first session. Their levels of self-esteem appeared low. During the activities it became apparent that certain participants showed initiative by introducing innovative and creative body movements as part of a specific game.

*The learners took their places on the benches uncertainly, and moved around restlessly. Most of them crossed their arms in front of their bodies, and avoided eye contact with me. (Ref: session 1).*

*The next participant introduced himself, and repeated the rhythm that the previous participant had used, but added an interesting body movement to the rhythm. (Obs – session 2)*

*The fifth participant introduced herself to the group, and used an interesting, creative body movement with her name. (Obs – session 2)*

*It was clear that the participant whose movements were echoed by the group was enjoying the responses to his movements, as he smiled broadly each time the group responded accurately to one of his movements. Afterwards the group clapped hands spontaneously. (Obs – session 7)*

#### 4.2.3.2 *Self-efficacy*

Experiences of participants included a belief in their (learning) potential, to attempt a new creation, and in this case it was the combination of an interesting body movement which accompanied their names.

*The fifth participant introduced herself to the group, and used an interesting, creative body movement with her name. (Obs – session 2)*

*It was clear that the participant whose movements were echoed by the group was enjoying the responses to his/her movements, as he/she smiled broadly each time the group responded accurately to one of his/her movements. Afterwards the group clapped hands spontaneously. (Obs – session 7)*

#### 4.2.3.3 *Connectedness*

##### 4.2.3.3.1 *To self*

While observing the participants, it became clear that they experimented with their own rhythmic creations on their drums, as well as with alternative drum playing techniques. Participants further gave accounts of how they felt (special), how they felt that the music inside them was brought out, and how the rhythm gave the body a beat.

*At the end of a session when the researcher allowed free rumble time on their drums, it was clear that at least five participants experimented with interesting rhythms, as well as different playing techniques (Obs – session 7)*

*... dit het my spesiaal laat voel. (P13: Dia) [... it made me feel special.]*

*... dit het die musiek van binne my uit te bring. (P11: Dia) [... it made the music from inside me come out.]*

*... die beat laat jou lyf lekker ritme kry. (P3: D) [... the beat let's your body get a nice rhythm.]*

#### 4.2.3.3.2 *To other members of the group*

The researcher's observations revealed that participants took part in groupwork. They played together as a group, and chanted well together as a group. The participants further worked together in rhythm as a group. In one instance the group had to repeat a specific rhythm a number of times, and eventually managed to play together. Participants' reflections also indicated that they had experienced that the group was beginning to function effectively as a unit, and that to work and play together as a group was a pleasurable experience. They also reflected that the music started to come together.

One participant described his/her experience of playing together as a group as a pleasurable experience. The researcher noted in the observations that the group displayed empathy on their faces when one of the participants declared that he/she did not feel well.

*The combined response from the group was accurate, taa-taa-taa. (Obs – session 1)*

*The group chanted together well and a feeling of calmness and serenity was felt. (Obs – session 4)*

*I let the group continue with the set rhythm, and introduced the next sentence, while they continued to play together with a steady beat. (Obs – session 4)*

*The participant played a very interesting rhythm on his drum, and the group accurately reflected this fairly complicated rhythm. (Obs – session 4)*

*The next rhythm was taa-taa-taa, and the group reflected this rhythm accurately as well. (Obs – session 4)*

*After approximately 10 attempts, the group managed to grasp the idea and started to move together, and achieved one communal sound from all their shakers. (Obs – session 5)*

*They played well together. (Obs – session 5)As the rain grew louder, I started counting down, 3 – 2 – 1, and then the group played the thunderbolt together. They all played at exactly the right moment, and the sound was loud, and effective. (Obs – session 7)*

*... die musiek het mooi saamgekom. (P4: Dia) [... the music came together nicely.]*

*... almal het saam gespeel. (P4: Dia) [... everyone played together.]*

*... was 'n plesier om saam almal te werk. (P10: Dia) [... it was a pleasure to all work together.]*

*... ons het nou almal saam gespeel en dit was lekker. (P1: Dia) [... we all played together now and it was nice.]... ek kan voel dat ons as 'n groep saam begin werk. (P5: Dia) [...I can feel that we are starting to work together as a group.]... ons het lekker saam gewerk. (P9: Dia) [... we worked together well.]*

*... op ons laaste speletjie het ons baie goed afgesluit.” (P14: Dia) [...with our last game we ended very well.”*

*“The group looked around and appeared restless and unfocused. Eventually they looked at the participant who had said, “Ek voel sleg vandag” [I don't feel well today]. Their facial expressions reflected concern and sympathy.” (Obs – session 3)*

#### 4.2.3.3.3 *To nature*

Participants' experiences of being connected to nature indicated a connection to the natural world. Examples of these experiences included the nature of music that flowed through their minds.

*... die natuur van die musiek het deur my gedagte gevloei.(P5: Dia) [The nature of music flowed through my thoughts]The group seemed peaceful and quiet and enjoyed the calmness and meditative quality of this activity.(Obs – session 8)*

*The participants seemed to relax and enjoy this calming, soothing and experimental activity. (Obs – session 8)*

#### 4.2.3.4 *Creative, free expression and experimentation*

Resonating with the theme of creativity and free expression in the first category, participants responses regarding the free and creative nature of their experiences warrant a theme on its own. Participants' experiences displayed experimentation with drumming

techniques, as well as free expression while drumming together as a group. Participants were also introduced to the concept of polyrhythms (rhythms that make use of two or more different rhythms simultaneously), and the creation of a new rhythm was required from each participant. The group actively took part in this creative exercise. Participants expressed their freedom in their bodies as well by tapping their feet, smiling, moving their bodies rhythmically and clapping hands. The creative expression was further evident in the continuation of playing their instruments, as well as in the musical expression of increasing and decreasing of volume. One participant reflected that he/she could express his/her feelings.

*The next participant played a relatively simple rhythm ... but introduced a drumming technique where both hands moved gradually to the middle of the drum, while playing. The group concentrated and focused, and had some difficulty in repeating the rhythm and technique accurately, but succeeded after the third attempt. (Obs– session 4)*

*The first member of the group started to play his word, and the others joined in one by one, thus creating polyrhythms. This exercise continued for approximately three minutes, and the children looked focused and enjoyed the activity. (Obs – session 5)*

*The movement continued for at least three minutes and the children laughed, tapped their feet, moved their feet rhythmically, and clearly enjoyed the exercise. (Obs – session 6)*

*This exercise was freely structured and allowed room for experimentation and free play. The group laughed and moved around with their bodies. They clearly enjoyed the creative freedom, and freedom of expression. A variety of different sounds and rhythms were heard. Some introduced their own thunderbolts in-between the rain. (Obs – session 7)*

*The group member who had joined me in the middle of the drum circle evidently enjoyed the responses to his/her movements. Afterwards the group clapped hands spontaneously. (Obs – session 7)*

*The rhythms gradually joined with each other, and a gentle beat developed. The participants smiled at each other and swayed their bodies to the beat. (Obs – session 8)*

*I gave the group the opportunity to end with a free rumble session while they chanted the affirmation, 'We all stand together'. The group experimented with various rhythms, and moved their upper bodies while playing. They also moved their heads from left to right while playing. (Obs – session 8).*

*The participants seemed to relax and enjoy this calming, soothing and experimental activity. They continued to play on the wooden frogs for at least five more minutes. The sound was initially soft, but grew in volume, and eventually died down again. (Obs – session 8)*

*... omdat ek my gevoelens kan express. (P2: Dia) [... because I can express my feelings.]*

#### **4.3 SUMMARY**

The overall aim of this chapter was to present and discuss the categories of findings from the study, constituting by the themes which emerged from the data. This was achieved through analysing the experiences of the adolescents. The themes reflected the experiences of adolescents who participated in a djembe drumming group. In Chapter 5, the research findings are presented as they relate to the research questions, limitations of the study, recommendations for schools, and future research. A final conclusion is offered.

## CHAPTER 5

# DISCUSSION AND CONCLUDING REMARKS, LIMITATIONS, STRENGTHS AND RECOMMENDATIONS

### INTRODUCTION

This research investigation aimed to get a better understanding of the experiences of adolescents taking part in a djembe drumming group. The research questions were approached through the lens of an interpretive research paradigm, and the study was conducted using a qualitative methodology. The use of qualitative data analysis enabled the researcher to gain better insight into the feelings, beliefs and experiences of the adolescents, and thereby to formulate a better understanding of these experiences. The research findings indicated that adolescents taking part in a djembe drumming group had positive experiences, also in relation to the effect of the drumming group on their learning.

This chapter presents a discussion on the research findings, as well as a discussion on the various limitations, challenges and strengths of the study. Lastly, the recommendations for djembe drumming groups in support of learning are discussed, as well as suggestions or possibilities for future research.

### 5.1 DISCUSSION OF RESEARCH FINDINGS

This section focuses on discussing the findings of the research and comparing them with the literature and theoretical frameworks that were discussed in Chapter 2. It is therefore necessary to revisit the aim of the research as well as the research question. The aim of the research was to explore the experiences of adolescents by using djembe drumming as an activity to support and increase self-esteem and build a sense of self-efficacy. In doing so, the researcher aimed to conceptualise the meaning that drumming gave to the participating adolescents' experiences and to gain insight into the extent to which drumming could serve as an intervention to support learning and academic development. The main research question was:

*How does djembe drumming facilitate learning in a group of adolescents?*

The different themes and the associated categories of findings are discussed in relation to the literature that informed this study.

### **5.1.1 Adolescents' lived experiences of the impact of djembe drumming on learning**

In the literature review, various theoretical approaches were discussed. This brought a better understanding of the insights, models and theories of others, such as the bioecological model of Bronferbrenner (1979); Erikson's (1963) basic framework, the psychosocial theory, for understanding the development of adolescents; the social cognitive theory of Bandura (1991; 1997; 1999); and the neurological development of the adolescent of Suleiman et al. (2015); Steinberg (2008); and Ernst et al. (2006).

Bronferbrenner's bioecological model emphasises the importance of understanding the contexts in which learning takes place, as well as the dynamic interactions of these contexts with each other and the individual. This research study emphasized the importance of learning contexts. The group of participants, originating from a socially disadvantaged area interacted with the researcher, from a more advantaged context. As Swart and Pettipher (2011) point out, adolescents' perceptions of their systemic environment are central to their interaction with the environment, and therefore guides or influences their conduct towards other people as members of this systemic environment. The interaction of the researcher with the adolescent participants represented the interactions with their systemic environment, also referred to as proximal interactions (Bronferbrenner, 1979). The researcher is of the opinion that certain outcomes of the research may be directly related to the proximal interactions that resulted. The clear difference in social contexts between researcher and participants, the novelty of being exposed to a musical activity, and the experience of certain qualities of a therapeutic relationship, such as unconditional positive regard, and empathy, may have had a positive effect on the outcomes.

The various findings that emerged from this case study showed a marked correspondence with the theoretical approaches named above. The bioecological framework of Bronferbrenner (1979), corresponds with the adolescents' experiences in a number of ways, as described below.

The findings of the adolescents' experiences on the level of the microsystem refer to their experiences of success with and mastery of music, which contributes to building a sense of self-efficacy. Interactions with the researcher represent their experience of the mesosystem, where the researcher offers a supportive relationship and interaction in the form of the music therapeutic activities, and thereby strengthens the developmental process through positive and supportive interactions. Life experiences refer to the memories of significant events over time, which represent the chronosystem (Swart & Pettipher, 2011; Bronfenbrenner, 1979). The experience of the djembe drumming group that took place in 2014 can be attributed to a significant event, and development over time took place before data was gathered for the second focus group interview in 2015. This development has been shown to be positive academic development in most of the members of the group.

Throughout the data, and as shown in the themes, there were references to the adolescents' positive enjoyment and to their belief that they could accomplish complex rhythmic patterns. There was also evidence of their eventual expressive creations. The adolescents' confidence were reflected in experimental attempts, jamming and free rumbling sessions by the participants. This corresponds with the effects of self-efficacy beliefs on cognitive processes, as Bandura (1991) has shown that human behaviour is to a large extent purposive, and regulated by forethought of embodying specific goals. The stronger the perceived self-efficacy, the higher the goal challenges individuals set for themselves. The model of five levels of contact, as developed by Steen-Moller (1996) embodies, and corresponds with, the behaviour of the participants as an awareness of self, the environment, and of interactions developed on level five. Objectives during this stage include nurturing the sense of autonomy and agency, and further developing the communicative skills, such as flexibility, creativity, listening, and response to content. This sense of autonomy and agency seems reminiscent of Bandura's sense of self-efficacy.

The data further reflect that the participants valued the connection with other members of the group, and reflected on being part of a group with positivity and enjoyment. This corresponds with the description of the adolescent developmental phase during which young people become more aware of themselves and their identities, and also find the social, interactive situations as the spaces where they develop self-esteem (Harter,

1999). Wigram (2004) noted that when two or more individuals engage in musically expressive behaviour, they are communicating, and contact is thus established. The building of proximal relations, as advocated by the developmental theories of Bronfenbrenner, can thus be facilitated by engagement in musically expressive behaviour.

The theme, connectedness to self, emerged from the data, and participants' experiences reflected that the involvement in the drumming group gave them a feeling of being special and that the music that had always been inside them had been brought out. The development of a lasting, integrated sense of self is central to the identity formation phase, which forms part of Erikson's psychosocial theory (1963). The development of identity is central to adulthood, and in many other aspects of an individual's life, including cognitive processes. The themes of spirituality and serenity also seemed to support this contemplative space where the adolescents had the opportunity to become aware of themselves and who they were.

The goal of achieving change in music therapy may be in the areas of attention, concentration, impulse control, social functioning, self-esteem, self-expression, motivation, and cognition (Pelliteri, 2000). Participants' experiences in the drumming group corresponded with these goals as they reported an awareness and understanding of their own learning processes. They indicated that there were certain techniques used in the drumming group which they had applied successfully later in their own learning.

The theme, positivity and enjoyment, under the category participants' experiences in the moment, reflected positive experiences of feeling alive, excited and inspired, and also the enjoyment of a fun-filled activity. These reflections correspond with Kalani's (2004) view that group drumming should be fun and playful. Oaklander (2006) reiterates Kalani's view in that she is of the opinion that a child and adolescent's innate tendency is toward humour and playfulness, and this may be suppressed by traumatic and disruptive life experiences. The importance of providing children and adolescents with opportunities to play offers them a chance to proceed with the tasks of normal development.

A positive, supportive and inclusive immediate social environment can be seen as essential to the continuing well-being of marginalised adolescents (Berry, 1997; Gifford et

al. 2009). School-based music activities can offer this “tool for inclusion” (Saether, 2008), and this tool can be applied to integrate the past, present, and future in a way that restores a sense of identity, meaning, continuity, and belonging. The category, participants’ experiences in the moment, and the theme, serenity, reflected participants’ experiences of calmness, peace (which could indicate acceptance of self in the moment) and freedom (which could indicate autonomy). The category, participants’ experience with djembe drumming that may have an impact on learning, was divided into a theme called continued/lasting effect, in which participants indicated that they could foresee a continuation with the drumming sessions in future.

## 5.2 CONCLUDING REMARKS

As discussed in Chapter 1 and 3, this research aimed at answering the following research question:

*How does djembe drumming facilitate learning?*

Along with this question, there were also secondary research questions that further guided the process, and these were:

*What are the experiences of participating adolescents of taking part in a drumming group?*

*What specific experiences of participating adolescents can contribute to general improvement in their learning?*

*How do participant adolescents link the drumming activity with learning?*

These questions will now be addressed.

The experiences of the adolescents included experiences in the moment, and experiences in relation to self. Experiences in the moment included statements by the adolescents that reflected (feelings of) stimulating interest, positivity and enjoyment, mystic insight, and serenity. Experiences in relation to self included understanding and increase of self-esteem and self-efficacy, and a connectedness to self, the other members of the group,

and to nature. The potential for creativity, free expression and experimentation further emanated from these experiences.

Specific experiences which contributed to learning illustrated that the drumming sessions offered participants a sense of motivation, as well as an awareness and increase in self-esteem and self-efficacy. Participants demonstrated a comprehension of their own personal learning processes, and thus a meta-cognitive awareness. Experiences further demonstrated their own awareness of having to concentrate and focus in order to participate successfully in the drumming group. Participants declared that they could foresee that the drumming sessions would have a lasting effect, and anticipated this experience as positive and beneficial. A general improvement of marks was observed, which indicated that the drumming sessions could have had a positive effect on the outcome of participants' academic performance. However, the researcher would agree with other researchers that improvement in academic achievement is usually the result of many contributing factors, of which the drumming experience might have been only one. Experiences of the participants that related to learning also supported the assumption that the engagement in playful, imaginative, creative and free expression could contribute positively to normal cognitive development.

Participants linked the drumming activity in their accounts of their own learning strategies that they started using, and would use in future, such as studying with rhythm, and strengthening their memorising abilities by linking facts in a story. These strategies imply the development of meta-cognition in the participants. Participants experienced the drumming sessions as an activity that enabled them to concentrate and focus, and they related these two concepts to elements that were needed for learning.

### **5.3 LIMITATIONS AND STRENGTHS**

An important limitation in this study was the time allocation. It would have been preferable if the investigation could have been carried out over a longer period of time (at least eight weeks).

It was noted in Chapter 1, 2 and 3 that the research was carried out in a secondary school in a semi-rural area. The researcher experienced particular difficulties in terms of

obtaining fixed dates and a specific classroom in the school to carry out the research. Three fixed and scheduled times for the first session with the participants could not be carried out, as there were various other activities arranged for those days, of which the researcher was not informed prior to the time agreed on. The first session with the participants eventually took place on 22 September 2014.

It was arranged between the researcher, the headmaster, and a Grade 9 teacher that the drumming sessions would take place in the music room. However there was only one key for this room in the school, and the music teacher, who was in possession of the key, was absent from school during the time when the drumming sessions were about to start. The first two drumming sessions took place in the Geography classroom, which was not an empty classroom, but contained many desks and chairs, which had to be moved to arrange a space for the participants and the drums.

The researcher initially planned to conduct the eight drumming sessions during an eight week period, but due to various constraints at the school it was decided to carry out the eight sessions over a two-week period.

There were various other obstacles and interferences during the research, such as the location of the music room opposite the open area that was the school's designated hall area, and, from time to time, high levels of external noise. A further distraction was caused by other learners coming into the music class at various times and breaking the focus and connection that had been created between the drummers.

The socially disadvantaged area in which the study was carried out presented particular difficulties, such as the noise levels in the rest of the school, the disturbances, and the constant changes in schedule. However, this limitation in itself offers a strength in that it provides an understanding of the functioning of many schools in socially disadvantaged areas in South Africa. A researcher needs to adapt and find creative ways around daily variations of the set programme of a research investigation.

An imbalance of power seemed to be present between the researcher and the participants, in terms of resources, age and education. The researcher noted a change, or a reduction in the levels of tension between the participants and the researcher, as time went

by and the participants got to know the researcher better. They also seemed more comfortable when she wore simpler and more modest clothes. Therefore, many of the participants' responses may have been offered to please the researcher, and were not necessarily an authentic experience.

The noted power imbalance, between the researcher and participants indicates that the quality of the proximal interactions was not ideal, and may have been influenced by the different social contexts of the researcher and participants. The effect thereof was felt especially in focus group interview 2, which was conducted approximately six months after the intervention. The information gained from this interview was also limited and sparse.

Contrary to expectations, with regard to music, conversations, and body language, the task of data analysis proved to be a mammoth task. Findings may appear to be based on thin data, although there could have been several systemic influences which could have contributed to that.

The researcher found limitations with regard to the vocabulary and language skills of the participants challenging, especially during the focus group interviews. Questions had to be adapted to suit the participants' developmental levels, while still ensuring that adequate data was collected to answer the research questions. During the focus group interview some participants readily shared their experiences verbally, while the largest portion of the group preferred to communicate using non-verbal behaviour, such as shaking their heads or smiling. This was quite challenging, as it meant that the researcher had to take a more direct position, in terms of asking specific participants short and direct questions, to attempt to elicit feedback from all the participants, without coercing them into answering in certain ways.

With regards to the second secondary research question, *'what specific experiences of participating adolescents can contribute to general improvement in their learning?'*, the opinion of the researcher is that this question was not sufficiently answered. Due to various other limitations, as mentioned above, a direct link could not be drawn from the experiences of the adolescents to a general improvement in their learning. Although many positive outcomes in the various data sources were noted, the researcher accepts that other factors,

in particular therapeutic conditions, such as unconditional positive regard and empathy may have influenced the participants to respond positively.

## **5.4 RECOMMENDATIONS**

### **5.4.1 Use of a similar programme in schools**

The researcher is of the opinion that djembedrumming can be used effectively as a therapeutic “tool for inclusion” in all schools, but in particular, in schools located in socially disadvantaged areas (Saether, 2008). Many children and adolescents in schools situated in areas where poverty and other social ills are rife have been exposed to violent and traumatic life experiences, and are thus negatively affected on social, cognitive, and affective levels (Flouri, & Kallis, 2011; Lindsey, Joe, & Nebbitt, 2010). Djembe drumming programmes, presented by specialists in music who have sound psychological and therapeutic backgrounds, can be highly efficient in addressing negative life experiences (Flores, 2011). The current research investigation demonstrated that many of the participants discovered meaning in the therapeutic relationship, as well as in the experience of comprehensive rhythmic activities, and that it can play a role in their academic and learning development too.

The researcher believes that this programme is of high value to the South African education system, where serious imbalances in educational levels create a need for tools to be used in promoting and encouraging an inclusive education system. The drumming workshop programme offers the opportunity to strengthen self-confidence and self-efficacy, and ultimately increase motivation in school-based activities (Pavlicevic, 1994). Such a programme should be offered as a necessary intervention at schools.

### **5.4.2 Possibilities for future research**

Further studies are needed to explore the potential benefits of African drumming. African drumming presented as a long-term intervention programme would be a valuable area of exploration. Correspondingly, a more intensive programme, allowing for a greater degree of contact between facilitator and participants (more frequent sessions for

example), would provide additional insight into the effectiveness of African drumming as an intervention.

There is a need for comparable research with the potential of expanding upon the generalisability of the findings. Similar projects, for example, may be conducted with different age groups, for varying durations of time, and in alternative settings, including more advantaged settings. It is hoped that future research will contribute to the body of research informing the field of music education and therapy.

## **5.5 CONCLUSION**

This study represents a step in understanding the experiences of adolescents taking part in a drumming group, and the effects thereof on their learning. The study illustrates the value and significance of the experiences of these particular participants, and the influence thereof on their learning. It further enables a better understanding of the potential of, and need for, future research into such an intervention.

As mentioned in Chapter 2, the Salamanca Framework for Action states that in an attempt to reduce exclusion from the curriculum and the school, a continuum of support should be provided. This attempt at the reduction of exclusion facilitates the development of inclusive schools. The researcher is of the opinion that djembe drumming workshops can address the diverse nature of learners in South African schools, offer a means of accepting diversity and embracing inclusion as well as restoring a sense of identity, meaning, continuity and belonging.

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# Appendix A

## ETHICAL CLEARANCE



UNIVERSITEIT • STELLENBOSCH • UNIVERSITY  
jou kennisvenoot • your knowledge partner

### Approved with Stipulations Response to Deferral

13-Jun-2014  
Coetzee, Elthea E

**Proposal #: HS1030/2014**

**Title: Adolescents' experiences of djembe drumming as an activity to support their learning.**

Dear Ms Elthea Coetzee,

Your **Response to Deferral** - (*New Application*) received on **08-May-2014**, was reviewed by the Research Ethics Committee: Human Research (Humanities) via Committee Review procedures on **29-May-2014**.

Please note the following information about your approved research proposal:

Proposal Approval Period: **29-May-2014 -28-May-2015**

**Present Committee Members:**

De Villiers, Mare MRH  
Theron, Carl CC  
Fouche, Magdalena MG  
Van Wyk, Berte B  
Horn, Lynette LM  
Nell, Theodore TA  
Leonard, Basil BC  
De Villiers-Botha, Tanya T  
Prozesky, Heidi HE  
GRAHAM, Clarissa Jane  
Manuel, Ashwin AS

The following stipulations are relevant to the approval of your project and must be adhered to:

**The previous recommendations have been addressed and the research can commence as soon as permission from the WCED is received. The researcher is requested to forward a copy of the WCED permission letter to the REC.**

Please provide a letter of response to all the points raised IN ADDITION to HIGHLIGHTING or using the TRACK CHANGES function to indicate ALL the corrections/amendments of ALL DOCUMENTS clearly in order to allow rapid scrutiny and appraisal.

Please take note of the general Investigator Responsibilities attached to this letter. You may commence with your research after complying fully with these guidelines.

Please remember to use your **proposal number (HS1030/2014)** on any documents or correspondence with the REC concerning your research proposal.

Please note that the REC has the prerogative and authority to ask further questions, seek additional information, require further modifications, or monitor the conduct of your research and the consent process.

Also note that a progress report should be submitted to the Committee before the approval period has expired if a continuation is required. The Committee will then consider the continuation of the project for a further year (if necessary).

This committee abides by the ethical norms and principles for research, established by the Declaration of Helsinki and the Guidelines for Ethical Research: Principles Structures and Processes 2004 (Department of Health). Annually a number of projects may be selected randomly for an external audit.

National Health Research Ethics Committee (NHREC) registration number REC-050411-032.

We wish you the best as you conduct your research.

If you have any questions or need further help, please contact the REC office at 0218089183.

**Included Documents:**

Questionnaire  
Revised bio questionnaire  
Revised ICF\_parent  
Revised DESC application  
Principal permission letter  
Consent Form  
Research Proposal  
Inst. Permission Application  
Permission Letter  
Revised teacher questionnaire  
Desc Form  
Revised research proposal  
REC Application Form  
Revised ICF\_teacher  
Revised ICF\_adolescent  
Revised observation schedule  
Letter of support\_supervisor  
Checklist  
Revised REC application  
Revised WCED application

Sincerely,

Clarissa GRAHAM  
REC Coordinator  
Research Ethics Committee: Human Research (Humanities)

# Investigator Responsibilities

## Protection of Human Research Participants

Some of the general responsibilities investigators have when conducting research involving human participants are listed below:

1. Conducting the Research. You are responsible for making sure that the research is conducted according to the REC approved research protocol. You are also responsible for the actions of all your co-investigators and research staff involved with this research. You must also ensure that the research is conducted within the standards of your field of research.
2. Participant Enrollment. You may not recruit or enroll participants prior to the REC approval date or after the expiration date of REC approval. All recruitment materials for any form of media must be approved by the REC prior to their use. If you need to recruit more participants than was noted in your REC approval letter, you must submit an amendment requesting an increase in the number of participants.
3. Informed Consent. You are responsible for obtaining and documenting effective informed consent using **only** the REC-approved consent documents, and for ensuring that no human participants are involved in research prior to obtaining their informed consent. Please give all participants copies of the signed informed consent documents. Keep the originals in your secured research files for at least five (5) years.
4. Continuing Review. The REC must review and approve all REC-approved research proposals at intervals appropriate to the degree of risk but not less than once per year. There is **no grace period**. Prior to the date on which the REC approval of the research expires, **it is your responsibility to submit the continuing review report in a timely fashion to ensure a lapse in REC approval does not occur**. If REC approval of your research lapses, you must stop new participant enrollment, and contact the REC office immediately.
5. Amendments and Changes. If you wish to amend or change any aspect of your research (such as research design, interventions or procedures, number of participants, participant population, informed consent document, instruments, surveys or recruiting material), you must submit the amendment to the REC for review using the current Amendment Form. You **may not initiate** any amendments or changes to your research without first obtaining written REC review and approval. The **only exception** is when it is necessary to eliminate apparent immediate hazards to participants and the REC should be immediately informed of this necessity.
6. Adverse or Unanticipated Events. Any serious adverse events, participant complaints, and all unanticipated problems that involve risks to participants or others, as well as any research related injuries, occurring at this institution or at other performance sites must be reported to Malene Fouch within **five (5) days** of discovery of the incident. You must also report any instances of serious or continuing problems, or non-compliance with the REC's requirements for protecting human research participants. The only exception to this policy is that the death of a research participant must be reported in accordance with the Stellenbosch University Research Ethics Committee Standard Operating Procedures. All reportable events should be submitted to the REC using the Serious Adverse Event Report Form.
7. Research Record Keeping. You must keep the following research related records, at a minimum, in a secure location for a minimum of five years: the REC approved research proposal and all amendments; all informed consent documents; recruiting materials; continuing review reports; adverse or unanticipated events; and all correspondence from the REC
8. Provision of Counselling or emergency support. When a dedicated counsellor or psychologist provides support to a participant without prior REC review and approval, to the extent permitted by law, such activities will not be recognised as research nor the data used in support of research. Such cases should be indicated in the progress report or final report.
9. Final reports. When you have completed (no further participant enrollment, interactions, interventions or data analysis) or stopped work on your research, you must submit a Final Report to the REC.
10. On-Site Evaluations, Inspections, or Audits. If you are notified that your research will be reviewed or audited by the sponsor or any other external agency or any internal group, you must inform the REC immediately of the impending audit/evaluation.

## Appendix B

### WCED RESEARCH APPROVAL

**REFERENCE:** 20140506-29220

**ENQUIRIES:** Dr A T Wyngaard

Mrs Elthea Coetzee  
21 Florida Street  
Paradyskloof  
Stellenbosch  
7600

**Dear Mrs Elthea Coetzee**

**RESEARCH PROPOSAL: ADOLESCENTS' EXPERIENCES OF DRUMMING AS AN ACTIVITY TO SUPPORT THEIR LEARNING**

Your application to conduct the above-mentioned research in schools in the Western Cape has been approved subject to the following conditions:

1. Principals, educators and learners are under no obligation to assist you in your investigation.
2. Principals, educators, learners and schools should not be identifiable in any way from the results of the investigation.
3. You make all the arrangements concerning your investigation.
4. Educators' programmes are not to be interrupted.
5. The Study is to be conducted from **30 May 2014 till 28 August 2014**
6. No research can be conducted during the fourth term as schools are preparing and finalizing syllabi for examinations (October to December).
7. Should you wish to extend the period of your survey, please contact Dr A.T Wyngaard at the contact numbers above quoting the reference number?
8. A photocopy of this letter is submitted to the principal where the intended research is to be conducted.
9. Your research will be limited to the list of schools as forwarded to the Western Cape Education Department.
10. A brief summary of the content, findings and recommendations is provided to the Director: Research Services.
11. The Department receives a copy of the completed report/dissertation/thesis addressed to:

**The Director: Research Services  
Western Cape Education Department  
Private Bag X9114  
CAPE TOWN  
8000**

We wish you success in your research.

Kind regards.

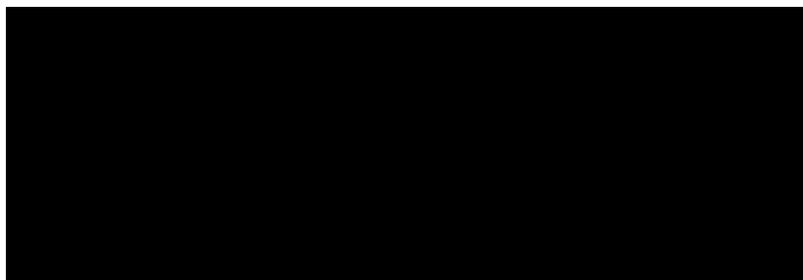
Signed: Dr Audrey T Wyngaard

**Directorate: Research**

**DATE: 09 May 2014**

# Appendix C

## PRINCIPAL CONSENT FORM



### **VIR WIE DIT MAG AANGAAN**

Hiermee gee ek toestemming dat die volgende studie in my skool mag plaasvind.

#### **Titel van die studie:**

**Adolescent's experiences of Djembe drumming as an activity to support their learning.**

#### **Doel van die studie:**

Die doel van die studie is om die effek van deelname aan 'n musikale aktiwiteit soos 'n drumgroep te evalueer, en te bepaal of hierdie deelname 'n positiewe uitwerking op die leerling se selfbeeld sal hê, en uiteindelik ook 'n positiewe invloed op sy/haar akademiese prestasie sal hê.

#### **Metode:**

- 15 Leerders sal deelneem aan die studie. Die navorsing verduidelik aan 'n Graad 9 klas en leerders wat belangstel om deel te neem aan die studie al vrywillig aandui dat hulle graag sal wil deelneem aan die studie..
- 8 sessies van 1 uur elk plaasvind op Iye wat ██████████ **Sekondêre Skool** pas, sowel as die leerders. Die navorsing stel Donderdag vana<sup>e</sup> 13:00 – 14:00 voor.
- Waarneming sal plaasvind deur die sessies op video op te neem, fokusgroepe met die leerders te hou, asook onderhoude met die klasonderwysers, om sosioëte te evalueer of leerlinge se gedrag, en akademiese prestasie verbeter.

 **Sekondêre Skool** sal graag aan hierdie projek deelneem. Ouers moet net vooraf ingelig word rondom hierdie projek en die WKOD moet skriftelik toestemming verleen dat hierdie projek met leerders van die skool onderneem mag word.



Prinsipaal

## Appendix D

### PARTICIPANT INFORMED CONSENT FORM



#### INLIGTINGSTUK EN TOESTEMMINGSVORM VIR DEELNEMERS

**TITEL VAN NAVORSINGSPROJEK:** ADOLESENTE SE ERVARINGS VAN DJEMBE DROMSPEL AS 'N AKTIWITEIT OM HULLE LEER TE ONDERSTEUN

**NAVORSER(S):** THEA COETZEE

**ADRES:** FLORIDASTR. 21 PARADYSKLOOF STELLENBOSCH 7600

**KONTAKNOMMER:** 0786776115

#### Wat is navorsing?

Deur navorsing leer ons hoe dinge (en mense) werk. Ons gebruik navorsingsprojekte of -studies om meer oor siektes uit te vind. Navorsing leer ons ook hoe om siek kinders beter te help of te behandel.

#### Waaroor gaan hierdie navorsingsprojek?

Hierdie navorsingsprojek gaan aan adolessente (tienaers) van 'n spesifieke skool (██████████ Senior Sekondêre Skool) die kans gee om vir 8 weke, een maal per week vir 'n uur in 'n groep op dromme te speel. Ek wil graag weet hoe adolessente deelname aan 'n drom groep ervaar en daaroor dink. Ek wil ook graag weet of dit 'n rol kan speel om skoolwerk en leer makliker te maak.

### **Hoekom vra julle my om aan hierdie navorsingsprojek deel te neem?**

Ek het besluit op 'n graad 9 klas omdat ek graag leerders tussen 15 en 17 jaar oud aan dromspel wil blootstel, en vra almal in die klas om vrywillig aan hierdie projek deel te neem.

### **Wie doen die navorsing?**

Ek (Thea Coetzee) sal die navorsing doen. Ek het musiek studeer, en deur baie jare se musieklesse het ek gesien dat musiek 'n baie positiewe uitwerking op kinders en hulle skoolwerk kan hê. Op die oomblik is ek besig om te studeer om 'n Opvoedkundige Sielkundige te word, en as deel van die kursus moet ek 'n navorsingswerkstuk voltooi, en ek het gekies om hierdie navorsing te doen oor adolessente se ervarings van djembe dromspel.

### **Wat sal in hierdie studie met my gebeur?**

In hierdie studie sal ek van jou vra om vir 8 weke elke Saterdagoggend vir een uur saam met 14 ander adolessente (tienaers) by jou skool (Senior Sekondêre Skool) elkeen op 'n djembe drom te kom speel. 'n Djembe drom is 'n drom wat ongeveer 50cm hoog staan, van hout gemaak is, en met 'n leervel oorgetrek is. Ek sal vir julle verduidelik en wys hoe om die dromme te speel, hoe 'n mens verskillende ritmes kan namaak, self opmaak, en hoe 'n mens met die ander in die groep kan kommunikeer, deur middel van die drom. Ek sal ons sessies met 'n videokamera afneem. Ek sal ook met jule gesels gedurende die sessies en daarna as 'n groep.

### **Kan enigiets fout gaan?**

In hierdie studie kan daar nie iets gebeur wat jou siek laat voel, of pyn laat ervaar nie. As jy enigsins hartseer, ongelukkig of op enige manier ongemaklik voel, sal ek graag wil hê dat jy jou ouers hiervan vertel, of vir my (die navorser) of vir een van jou onderwysers wat jy vertrou.

### **Watter goeie dinge kan in die studie met my gebeur?**

In hierdie studie sal jy waarskynlik baie lekker voel gedurende en na die dromsessies, aangesien ander navorsers al bewys het dat deelname aan so 'n dromgroep 'n baie lekker ervaring vir die meeste mense is. Bevindinge van die navorsing sal bekend gemaak word aan die universiteit en ook aan ander mense, wat dan ook ander adolessente (tienaers) kan help met dromsessies.

### **Sal enigiemand weet ek neem deel?**

Ja, die skool en gemeenskap sal bewus wees van jou deelname aan die dromgroep. Die inligting wat ek as die navorsers versamel sal egter konfidensieel gehou word op my rekenaar, wat beskerm is met 'n kode waartoe net ek toegang het. Ek gaan ook vir elke deelnemer 'n skuilnaam gee, sodat dit wat jy sê en doen nie bekend sal wees nie.

### **Met wie kan ek oor die studie praat?**

Indien jy enige vrae oor die studie het kan jy vir my of die studieleier (Me Mariechen Perold) kontak. Jy kan ook met die persoon wat in die afdeling Navorsingsontwikkeling van die Universiteit werk (Me Malene Fouché) kontak. Ons kontakbesonderhede is hieronder:

Me Thea Coetzee: 0786776115

Me Mariechen Perold: 0218082307

Me Malene Fouché 0218084622

### **Wat gebeur as ek nie wil deelneem nie?**

Jy mag weier om deel te neem aan hierdie studie, selfs al het jou ouers ingestem. As jy besluit om wel deel te neem, kan jy op enige stadium onttrek sonder om in die moeilikheid te beland.

Verstaan jy hierdie navorsingstudie, en wil jy daaraan deelneem?

JA

NEE

Het die navorser ál jou vrae beantwoord?

 JA NEE

Verstaan jy dat jy kan ophou deelneem net wanneer jy wil?

 JA NEE

---

Handtekening van kind

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Datum

## Appendix D

### PARTICIPANT INFORMED CONSENT FORM

#### INFORMATION AND CONSENT FORM FOR PARTICIPANTS

TITLE OF RESEARCH PROJECT: ADOLESCENT'S EXPERIENCES OF DJEMBE DRUM GAME AS A LEARNING ACTIVITY FOR THEIR SUPPORT

RESEARCHER (S): THEA COETZEE

ADDRESS: 21 FLORIDASTR. PARADYSKLOOF STELLENBOSCH 7600

CONTACT NUMBER: 0786776115

What is research?

Through research, we learn how things (and people) work. We use research projects or -studies to find out more about diseases. Research also tells us how to help or treat sick children better.

What is this research?

This research project is to adolescents (teenagers) of a particular school (XXXXX Senior Secondary School) the chance for eight weeks, once a week for an hour to play a group on drums. I would like to know how adolescents participating in a drum group experience and think about it. I would also like to know whether it can play a role in school work and learning easier.

Why do you ask me to participate in this research project?

I decided on a grade 9 class because I want to expose learners between 15 and 17 years old to play drum, and asked everyone in the class to volunteer to participate in this project.

Who does the research?

I (Thea Coetzee) will do the research. I studied music, and many years of music lessons, I saw that music can have a very positive impact on children and their school work. At the moment I am studying for an Educational Psychologist to be, and as part of the course, I was a research assignment complete, and I chose to do this research on adolescent's experiences of djembe drum game.

What will happen in this study with me?

In this study I ask you for eight weeks every Saturday morning for an hour with 14 other adolescents (teenagers) at your school (XXXXX Senior Secondary School) each on a djembe drum to come and play. a Djembe drum is a drum that is 50 cm high, made of wood, and with a leather skin overlaid. I will explain to you and show you how to play the drums, how one can imitate different rhythms, and how one of

the others in the group can communicate through the drum. I will tape our sessions with a video camera. I will also talk with you during the sessions and then as a group.

Can anything go wrong?

In this study if something happened that made you feel sick, or if you experienced pain, or if you felt sad, unhappy or in any way uncomfortable, I would want you to tell your parents, or me (the researcher) or one of your teachers you trust.

What good things can happen in the study with me?

In this study you will probably feel very good during and after the drum sessions, as other researchers have proven that participation in such a drum group is a very pleasant experience for most people. Findings from the research will be announced at the university and also to others, whatever other adolescents (teenagers) can also be helped by the drum sessions.

Will anyone know I participate?

Yes, the school and community will be aware of your participation in the drum group. The information that I will collect, will be kept by me, the researcher, confidential on my computer, protected with a code to which only I have access. I'm also going to give each participant a pseudonym, so that what you say and do will not be known.

Who can I talk about the study?

If you have any questions about the study, you can contact me or the supervisor (Ms Mariechen Perold). You can also contact the person in the department Research Development of the University (Ms. Malene Fouché). Our contact details are below:  
Ms Thea Coetzee: 0786776115  
Ms. Mariechen Perold: 0218082307  
Ms. Malene Fouché 0218084622

What happens if I do not want to participate?

You may refuse to participate in this study, even though your parents agreed. If you decide to participate, you can withdraw at any time without having to get into trouble.

Do you understand this research study, and want to participate?

I AGREE

Did the researcher answer all your questions?

I AGREE

Do you understand that you can stop participating whenever you want?

I AGREE

Signature of child	Date
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# Appendix E

## PARENT CONSENT FORM



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UNIVERSITEIT STELLENBOSCH

### TOESTEMMINGSVORM VIR OUERS

#### NAVORSINGSPROJEK: Thea Coetzee (MEdPsig student)

Hiermee word u toestemming gevra dat u kind \_\_\_\_\_ deelneem aan 'n studie oor die ervaring van deelname aan 'n drom groep wat 8 keer weekliks vir 8 weke sal bymekaarkom vir 1 uur by die skool. Die doel van hierdie navorsingsprojek is om die ervarings van die drom aktiwiteite en die effek van so 'n drom groep op leerders se leerervaringe te ondersoek. U toestemming word gevra dat u kind mag deelneem aan hierdie groepsaktiwiteit, asook dat die navorser toegang sal kry tot u kind se graad 8 en 9 rapporte. Onderhoude sal ook met die betrokke onderwysers gevoer word. Al die leerders in u kind se klas is genader om deel te neem aan hierdie musiekaktiwiteit. Deelname is vrywillig. Die eerste 30 leerders sal aan die aktiwiteit kan deelneem.

Die studie sal op Saterdagoggende of Vrydagmiddae by [REDACTED] Senior Sekondêre skool plaasvind vir een uur. Daar sal altesaam 8 sessies wees vanaf 15 September tot 27 September 2014.

Die leerlinge sal gedurende die Kuns- en Kultuurperiode, tydens skoolure, op dromme speel, en ek sal hulle afneem met 'n videokamera. Voordat die dromgroepe begin sal ek na die leerlinge se rapporte van graad 9 en 10 kyk.

Ek is tans 'n finale student in Opvoedkundige Sielkunde aan die Universiteit van Stellenbosch. As deel van my kursus moet ek 'n tesis (navorsingsopdrag) skryf oor 'n onderwerp wat vir my van belang is, en aangesien ek baie ondervinding as 'n musiekonderwyseres het, en aangesien ek baie graag meer inligting oor hierdie onderwerp wil versamel.

Alle inligting van die leerders sal anoniem gehou word, hulle name sal dus op geen stadium in my tesis, of aan enige persone by die Universiteit van Stellenbosch bekend gemaak word nie. Dis moontlik dat ander leerders, skoolpersoneel en mense uit die gemeenskap mag weet dat u kind deelneem aan die projek, maar die inligting wat verkry word, sal nie met u kind verbind word of bekend gemaak word nie.

**Naam van die student wat die studie gaan lei:** Thea Coetzee

**Toestemming:**

Hiermee gee ek \_\_\_\_\_ toestemming dat my kind  
\_\_\_\_\_ mag deelneem aan die studie.

\_\_\_\_\_  
**Handtekening van ouer**

\_\_\_\_\_  
**Datum**

# Appendix E

## PARENT CONSENT FORM

STELLENBOSCH UNIVERSITY

CONSENT FORM FOR PARENTS

RESEARCH PROJECT: Thea Coetzee (MEdPsych student)

You are hereby requested permission that your child \_\_\_\_\_ participate in a study on the experience of participating in a drum group eight times weekly for eight weeks for one hour at school. The aim of this research project is to examine the experiences of the drum activities and the effect of such a drum group on learners' learning experiences. You are asked for permission that your child may participate in this group activity, and that the researcher will have access to your child's grade 9 and 10 reports. Interviews will also be conducted with the teachers. All the students in your child's class have been approached to participate in this musical activity. Participation is voluntary. The first 15 students will participate in the activity.

The study will on Saturday mornings or Friday afternoons at XXXXX Senior Secondary school takes place for one hour. There will be a total of eight sessions from 15 September to 27 September 2014.

The pupils will participate during the Arts and Culture periods, during school hours and I will capture these sessions with a video camera. Before the drum groups begin I will look at the pupils' reports of Grade 9.

I am currently a final student of Educational Psychology at the University of Stellenbosch. As part of my course I have a thesis (research project) on a topic that interests me, and as I have experience as a music teacher, I would like to gather more information on this subject. All information of the children will be kept anonymous, their names will at no time be mentioned in my thesis, or to any persons to be made known at the University of Stellenbosch.

It is possible that other students, school staff and people from the community may know that your child participates in the project, but the information obtained will not be known or be connected with your child.

Name of the student who studies will lead: Thea Coetzee  
Consent:

I hereby give permission for my child \_\_\_\_\_  
\_\_\_\_\_ to participate in the study.  
\_\_\_\_\_

Signature of parent

Date

# Appendix F

## OBSERVATION SCHEDULE



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### ADOLESCENTS' EXPERIENCES OF DJEMBE DRUMMING AS AN ACTIVITY TO SUPPORT THEIR LEARNING

PROPOSED OBSERVATION SCHEDULE OF PARTICIPANTS DURING DRUMMING SESSIONS:

**Observation of participants will be done whilst focusing on the following aspects:**

1. Engagement in the activity will be observed in terms of the following aspects:
  - 1.1 body language (e.g. body swaying, and others)
  - 1.2 facial expression (e.g. smiling, and others)
  - 1.3 words which the participant uses whilst engaging in the activity
2. The researcher will observe whether the body language of the participants seem more or less relaxed as they attend more sessions.
3. The researcher will observe whether the participants add other musical aspects such as humming, whistling or foot tapping.

## Appendix G

### TEACHERS' CONSENT FORM



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#### INWILLIGING OM DEEL TE NEEM AAN NAVORSING

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“Adolescents’ experiences of djembe drumming as an activity to support their learning”

#### ONDERWYSERS

U word gevra om deel te neem aan ’n navorsingstudie uitgevoer te word deur Thea Coetzee, van die Departement Opvoedkundige Sielkunde aan die Universiteit Stellenbosch. Ek is tans besig met ’n Meestergraad in Opvoedkundige Sielkunde, en hierdie navorsing vorm deel daarvan. U is as moontlike deelnemer aan die studie gekies omdat u die leerders wat aan die dromsessies gaan deelneem ken, en ook waarneem in hulle klasse.

#### DOEL VAN DIE STUDIE

Die studie probeer vasstel of leerders se skoolwerk kan verbeter as hulle deelneem aan ’n musiekaktiwiteit. Hierdie musiekaktiwiteit sal wees om aan ’n dromgroep deel te neem. Daar sal ’n maksimum van 15 kinders tussen 15 en 17 jaar (graad 9) in twee moontlike groepe wees.

#### 1. PROSEDURES

Indien u inwillig om aan die studie deel te neem, vra ons dat u die volgende moet doen:

Ek sal van u vra om ’n 30 minute lange onderhoud met my te hê, waarin ek ’n paar vrae aan u sal stel oor die leerders se gedrag en prestasie in die klas.

#### 2. MOONTLIKE RISIKO'S EN ONGEMAKLIKHEID

Daar is geen risiko's aan u deelname aan hierdie projek verbonde nie. Die skoolhoof sowel as die WKOD het hulle toestemming hiertoe verleen.



**VERKLARING DEUR DEELNEMER OF SY/HAAR REGSVERTEENWOORDIGER**

Die bostaande inligting is aan my, [*naam van deelnemer*], gegee en verduidelik deur Thea Coetzee in *Afrikaans* en *ek is dié taal magtig*. Ek is die geleentheid gebied om vrae te stel en my vrae is tot my bevrediging beantwoord.

[*Ek willig hiermee vrywillig in om deel te neem aan die studie. 'n Afskrif van hierdie vorm is aan my gegee.*

---

**Naam van deelnemer**

---

**Naam van regsverteenvoordiger (indien van toepassing)**

---

**Handtekening van deelnemer**

---

**Datum**

**VERKLARING DEUR ONDERSOEKER**

Ek verklaar dat ek die inligting in hierdie dokument vervat verduidelik het aan *deelnemer*. Hy/sy is aangemoedig en oorgenoeg tyd gegee om vrae aan my te stel. Dié gesprek is in *Afrikaans* gevoer.

---

**Handtekening van ondersoeker**

---

**Datum**

## Appendix G

### TEACHERS' CONSENT FORM

#### CONSENT TO PARTICIPATE IN RESEARCH

"Adolescents' experiences or djembe drumming as an activity to support their learning"

#### TEACHERS

You are asked to participate in a research study conducted by Thea Coetzee, of the Department of Educational Psychology at the University of Stellenbosch. I am currently working on a Master's degree in Educational Psychology, and this research forms part of it. The children in your class may be a possible participant in this study. The children will participate in drum sessions, and I will observe in their classes. I'd like to talk to you about your observations as teachers.

#### 1. PURPOSE OF THE STUDY

This study aims to determine whether children's school work can improve when they participate in a musical activity. This musical activity will be a drum group. There will be a maximum of 15 children between 15 and 17 years (grade 9), and there may be two possible groups.

#### 2. PROCEDURES

If you volunteer to participate in the study, we request that you must do the following: I will ask you to conduct a 30 minute long interview with me, in which I will ask a few questions about the learners' behavior and performance in class.

#### 3. POTENTIAL RISKS AND DISCOMFORTS

There are no risks connected to your participation in this project. The principal and the WCED have granted their permission.

#### 4. POTENTIAL BENEFITS TO SUBJECTS AND / OR TO SOCIETY

There are no direct benefits to you related to the study. The possibility exists that if, however, it is found that participation in music activities can be beneficial to students, this will benefit their education in general.

#### 5. PAYMENT FOR PARTICIPATION

Participants in the study will not be compensated.

## 6. CONFIDENTIALITY

Any information obtained by means of the study and that can be related to you will remain confidential and will be disclosed only with your consent or as required by law.

Confidentiality will be maintained through the use of pseudonyms. Only I, as a researcher and my supervisor will have access to the data.

## 7. PARTICIPATION AND WITHDRAWAL

You can decide whether you want to participate or not in the study. If you volunteer to participate in the study, you can, at any time, withdraw without penalty. You can refuse to answer certain questions, but still participate in the study. The investigator can withdraw from the study if circumstances make it necessary.

## 8. IDENTIFICATION OF INVESTIGATORS

If you have any questions or concerns about the research, you are free to get in touch with myself as a researcher, and my supervisor. The details are as follows:

Researcher: Thea Coetzee (0786776115)

Supervisor: Ms. Mariechen Perold (mdperold@sun.ac.za, 021 8082307)

## 9. RIGHTS OF PARTICIPANTS

You may at any time withdraw your consent and discontinue participation without any adverse consequences for you. By participating in the research you are not waiving any legal claims, rights or remedies. If you have questions about your rights as a participant in research, contact Ms. Malene Fouché [mfouche@sun.ac.za; 021 808 4622] of the Division of Research Development at the University of Stellenbosch.

## STATEMENT BY ENTRANT OR HIS / HER LEGAL REPRESENTATIVE

The above information was explained to me [name of participant] by Thea Coetzee in Afrikaans, and this is my home language I had the opportunity to ask questions and my questions have been answered to my satisfaction.

[I hereby consent voluntarily to participate in the study. A copy of this form was given to me.

\_\_\_\_\_  
Name of legal representative (if applicable)

\_\_\_\_\_  
Signature of participant

\_\_\_\_\_  
Date

## STATEMENT BY investigator

I declare that I have explained the information contained in this document to participants. He / she is encouraged and given ample time to question me. The discussion is conducted in

Afrikaans.

---

Signature of investigator

---

Date

## Appendix H

### BIOGRAPHICAL QUESTIONNAIRE FOR PARTICIPANTS

Adolescents' EXPERIENCES OF Djembe Drumming as an activity to support their learning

#### DEMOGRAPHIC QUESTIONNAIRE TO PARTICIPANTS

1. Please indicate your age today (in years).

I am \_\_\_\_\_ year old today.

2. Please indicate in what grade you are today.

I am in grade \_\_\_\_\_ today

3. Please indicate whether you are male or female.

Male \_\_\_\_\_ Female \_\_\_\_\_

4. Please indicate how many years you've been living in the Stellenbosch area.

\_\_\_\_\_

## Appendix H

### BIOGRAPHICAL QUESTIONNAIRE FOR PARTICIPANTS



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#### ADOLESCENTS' EXPERIENCES OF DJEMBE DRUMMING AS AN ACTIVITY TO SUPPORT THEIR LEARNING

##### BIOGRAFIESE VRAELYS AAN DEELNEMERS

1. Dui asseblief aan wat jou ouderdom vandag is (in jare).

Ek is \_\_\_\_\_ jaar oud vandag.

2. Dui asseblief aan in watter graad jy vandag is.

Ek is in graad \_\_\_\_\_ vandag.

3. Dui asseblief aan of jy manlik of vroulik is.

Manlik \_\_\_\_\_ / Vroulik \_\_\_\_\_

4. Dui asseblief aan hoeveel jare jy al in die Stellenbosch omgewing woonagtig is.

\_\_\_\_\_

# Appendix I

## DRUMMING WORKSHOPS

### Workshop One

#### “Welcome in our village”

##### 1. Ceremonial opening

###### **Trip to the village**

Invite the participants to sit at the djembe drums, which have been placed in a circle beforehand. Welcome the participants to the drum circle. Explain to them that they will be visiting an imaginary place, a small hidden village, each time they join the drum circle. This village is nestled in a tranquil, lovely location, far, far away from the noisy city. In order to get to this village, they will have to climb over steep hills, swim across a wide river and crawl through a few deep valleys – an expedition that is exhilarating, but not dangerous. Ask the participants if they would like to make this journey with you. Once they have agreed, lead the group with pattering on their drums with their fingertips. Explain to them that they are tip-toeing down the corridor of the school, out of the school, off the school grounds.

Continue to facilitate the journey using soft drumming to represent the valleys and louder drumming (crescendos) to portray the hills. Guide the group further with sweeping, circular motions with the hands over the head of the drum – in an attempt to portray the sound of the rushing water.

Once the group has completed the journey, welcome the participants to their village. Invite them to name their village. This encourages a sense of ownership for their drum circle.

###### **Objectives**

The opening activity introduces the participants to the drum circle, and to the series of workshops. Participants are welcomed into the drumming “space”: this is the physical setting of the drum circle and a metaphorical place of community, safety and support. Throughout the sessions, this space will evolve into a secure setting that are capable of

accommodating the participants' creativity and supporting their musical/personal expressions. An additional objective of this activity is to introduce the participants to the drums in a playful manner that is not technical or intimidating.

## **2. Meet friends in the village**

### The Name Game

Suggest to the participants that music, and in particular rhythm, can be found in each of their names. Choose a participant (or invite someone to participate), and ask for her/his name. Discuss this name with the group, in terms of pronunciation, the amount of syllables, and on which syllable the accent lies. Explain to the group that they are going to play each of the participants' names on the drums. Start by clapping the chosen name with the group, clapping once on each syllable, and emphasising the accent. Vary the clapping between loud and soft to practise the rhythmic patterns of a few of the other names in the group. Describe to the group that the drums can be beaten loudly or softly, and they can also be used to express names. Go around the circle, giving each participant the opportunity to say his or her name, and then to translate it into a specific pattern. Propose to them that they first say and clap their names, in order to discover the rhythm, before transferring the pattern to the drum. Assist the participants, if needed. When each participant has had the opportunity to discover his/her name, invite the entire group to join in and play each of the names together as a group, chanting the participant's name over a few times. Continue until each name has been musically explored. If the participants seem to find this activity easy, they may further explore the high and low tones that can be produced on the drums. The high tones can be used to accent the dominant syllable of a name.

### **Objectives**

The social objective of this activity is to introduce the participants and the facilitator to each other. Each participant is integrated into the drumming circle, as he/she is individually validated and welcomed. The facilitator is assisted into learning the names of participants. The initial musical objective of the exercise is to acquaint the group with various simple rhythmic patterns. The group is further introduced to the concept of accents or dominant beats, whilst simultaneously experiencing the link between rhythm in music, and rhythm

inherent in spoken language. This activity presents a non-technical and non-threatening introduction to drumming.

### **3. The Village Call**

#### **The Attention Signal**

“Waka Waka...Eh Eh!”

The facilitator plays “waka waka” (ta-te-ta-te) on a drum (using low tones) and ask the group to clap ‘waka waka’ and say ‘eh eh’ (taa-taa), the rhythm is a four quaver, two crotchet pattern. Practise this rhythm with the group a few times at differing volume and tempo, assisting the group if necessary. Encourage prompt and accurate response, resulting in a ta-te-ta-te-taa-taa rhythm. Pass a small drum around, and give each participant the chance to give the attention call, while the rest of the group provides the response. Allow for creative play, let them experiment with different tempi and volumes. Give the group the opportunity to develop their own war cry.

#### **Objectives**

The war cry can be used throughout the programme to obtain the group’s attention, or bring them to a stop. The attention call represents a fun and playful way of maintaining order, and establishing necessary limitations and boundaries.

### **4. Grooving as a group**

#### **Introduction to Guidelines**

Briefly explain to the group about the importance of certain guidelines, as this allowed them to play together well as a group. Refer to the fact that drums are being ‘played’, and discuss the difference between work and play, referring to the fact that the drumming sessions were in fact ‘playshops’ and not ‘workshops’.

Explain to the group that you as a facilitator are not ‘strict’ or ‘harsh’ like teachers at school may be, it is important that there are still guidelines, to ensure that everyone enjoy their time together. Create an atmosphere of unconditional positive regard, within boundaries.

State that you are going to briefly discuss a few guidelines with the group. The purpose of these guidelines is to 'stay in tune' with the group, and help the drumming circle to stay 'in the groove' together. Discuss what 'in the groove' implies, 'in tune', 'in rhythm', 'in harmony', 'gelling' together. Introduce the following five guidelines:

1. Treat each other with respect.
2. Do your best to join in and play along.

Try to understand the rules and objectives of a game or activity.

Join in wholeheartedly.

Have fun!

1. Listen to the others, and play *with* them, not *against* them.
2. Don't play on your instrument when someone is speaking.
3. Help someone if he/she is struggling.

Discuss each guideline, and use the following method to aid in acceptance and internalisation of the rules and boundaries. After speaking about the first guideline, elicit the group's ideas on what it means to play together and join in. Check that everyone understands the first guideline, and if everyone does, beat together, once on the drum. Facilitate the group to drum one beat, together, in unison. Repeat this for each guideline, first discussing the guideline, eliciting ideas about it, and then finally let them beat two beats for guideline two, three times for guideline three, in an attempt to convey their understanding and agreement.

### **Objectives**

The objectives of this discussion is to include the setting of appropriate boundaries and limitations. If boundaries are consistently maintained in a clear and simple way, without being overly restrictive, provide adolescents with a sense of security and stability, in the process reducing anxiety and freeing the participants to explore their own creative, emotional and social processes.

## 5. Ritual Closing

### **A Journey**

Accompany the group in an imaginary journey back to the “real” world and to daily life. Start by guiding the participants to play softly with their fingers on the rim of the drum. Propose that you are walking through a deep valley. Assist the group to move into a gradual crescendo. Explain to the participants that you are climbing over a steep hill. Lead the group into a decrescendo, and explain that everyone is now descending into another valley. Initially the facilitator will guide the “travelling” group through the valleys and hills. Eventually the group will be able to “travel” by themselves to and from their village. The jointly created rhythm will lead the group. Once everyone has “arrived”, thank them all for their participation, and allow them to thank each other for sharing this special time together.

### **Objectives**

The closing activity (used ritualistically to close each workshop) serves to bring psychological closure to the participants as they prepare to leave the drum circle, and return to their “normal lives”. Emotions are settled, and the participants are grounded in reality.

### **Affirmation: “Ek is amazing!”**

### **Objectives**

The energetic finale serves to end the session on a positive “upbeat” note, and further provides the participants with an encouraging message to take with them. The lively rhythms and powerful collective playing are likely to be remembered and internalised.

## **Workshop Two**

### **“Welcome in our village”**

#### **1. Ritual opening**

##### **Welcome**

Participants are asked to wait outside the classroom and only enter the drumming room when they hear “waka waka”. The facilitator provides the call from inside the drumming room on one of the drums. As the group provides the appropriate response to the call, they are allowed to enter the room and take a seat at a drum. Wait until the participants spontaneously all join in to play the “eh eh” on their drums. Allow the call-and-response rhythm to continue for a few moments. The facilitator leads the group to vary the tempo and volume of the call. When the facilitator feels that everyone is comfortable and attuned to the group, bring the exercise to an end.

The facilitator commences by welcoming each member into the drum circle. Ask a member to volunteer, and ask the member if he/she will be willing to stand in the middle of the circle. The facilitator explains to the group that the group is going to find a rhythm for the participant in the middle of the circle’s name (just as they did in the first workshop). While the group plays the rhythm on their drums (and rhythmically chant his/her name), the participant in the centre must walk around the circle and shake each participant’s hand. The facilitator leads the group into playing the rhythm and chanting the name for a while, and then gesture for the participant to start walking around the circle to be welcomed by the group. When the first participant has been acknowledged by everyone in the group, gesture to him/her to return to their seat, and indicate to the participant to the left to stand in the centre of the circle. Continue until each member has been welcomed in the drum circle.

#### **2. Meet the village people**

##### **“Rhythmasize” your name**

Remind the participants of the rhythmic Name Game which they played in Workshop One. Suggest to the group that they now continue with this game and explore more music to be

found in each one's name. The participants' names are a big source of simple rhythmic patterns, and these are already familiar to the group. Variety in nuances, accents, variations of pitch and phrasing can be added to the names.

The facilitator gathers the participants together in a circle, with their djembe drums between their knees. Choose one participant's name as an example. Remind the group that they had found the rhythms inherent in everyone's names in the previous workshop. Clap and say the chosen name a few times with the group. The facilitator then discusses with the group that when we say a person's name, we often say it in a way that communicates meaning or expresses a feeling. An example is, depending on how a person's name is said, one can infer whether the person is calling you, looking for you, is angry with you, encouraging you or glad to see you. Explain further to the group that you are going to create a short phrase around the name, creating an even more interesting musical pattern. For example: "Ja-bu, where are you?" The rhythm of the phrase is:

"Ja – bu, where are you?"

Taa aa taa aa; Saa aa aa aa taa taa taa aa

The facilitator should emphasize elements such as pitch, phrasing, tempo and articulation as the phrase is interpreted on the drum. Continue in the same way around the circle, incorporating each child's name into a short, but expressive verbal/musical phrase. Kalani (2005) suggests the following kinds of phrases:

Lu cy, Oh Lu cy

Taa aa taa aa; Saa aa aa taa aa taa aa Saa aa aa

Ti ny Hey Ti-ny!

Ta-te saa saa sa-te; Ta-te saa saa sa-te

## Objectives

This activity is non-technical and a fun way of introducing the concepts of pitch, rhythm, tempo, phrasing, articulation and variation. The rhythms are acquired easily because of the

word connections. This experience encourages a sense of mastery among the participants. The use of peer names makes the rhythms more meaningful to the group. The rhythmic patterns of certain names may be interwoven to create simple polyrhythms. Further it expresses recognition and appreciation of the individual members of the drum circle.

### **3. Pass it on**

#### **Taking turns**

The facilitator instructs the participants to place the drums behind him/herself. The facilitator must place a small percussion instrument beside each participant. The facilitator should instruct participants not to play on the percussion instruments until the activity has begun. Emphasize to the participants that each one will get the opportunity to play on all the different instruments, they will be rotating the instruments to the participant on their left after every part of the activity. The facilitator explains to the group that they should play on their instrument when they are instructed to do so. When the facilitator indicates to another participant to play, the previous player should keep quiet. The aim is for one participant at a time to be playing, and for the others to listen.

For the first half of the activity, the facilitator can let the participants play anything they want, when the facilitator indicates to them to play. Later, the facilitator can make the activity more interesting by indicating a specific rhythmic pattern that they must play, when it is their turn. As a last alternative, a lively, rhythmic track of music can be played, and the facilitator can indicate to one participant at a time to accompany the music.

#### **Objectives**

The objective of this activity is for the participants to be introduced to the various instruments, their sounds and effective playing techniques. The participants further gain valuable practice at controlling their impulse to act without thinking it through first. This ability is often fragile with adolescents whose energy seem boundless and undirected, and who have difficulty maintaining good contact with self and others. This exercise offers the opportunity to teach participants to wait their turn and listen to the contributions of others; thus greater awareness of others in the environment is promoted.

#### 4. Affirmation Circle

##### **Sounds of celebration**

Gather all the participants in the drum circle. Facilitate a discussion about what they liked and enjoyed about the drumming circles. Attempt to generate as many ideas and descriptions as possible. Encourage the participants further to think of single words that accurately describe an aspect of their experience in the drumming group. Kalani (2004) suggests words like, joy, peace, love, spirit fun and freedom. Explain to the group that each one of them will get the opportunity to call out one of these words. Clarify that it does not matter if one participant chooses the same word as another, and that the activity can evolve around the circle more than once, should they need more time to express their ideas.

Facilitate the word calling process in the following manner; each word called out by a participant will form part of an eight beat phrase. The word will fit into the eighth beat. The entire group plays seven beats on their drums, and rest on the eighth beat, allowing a space for the word. The facilitator should guide the group to play: 1234123, and rest several times, and remain silent on the eighth beat. The facilitator then replaces the eighth beat with the word “fun”. Repeat this pattern a few times as well so that the group fully grasps the flow of the beats and the word. The facilitator can then ask if there is someone in the group that will be willing to start the exercise. Decide together as a group in which direction the affirmation words will travel. The facilitator should assist the group’s accurate playing and resting, and assist the participant who calls out a word to make his/her statement promptly on the eighth beat. The facilitator should further guide the group into immediately repeating the phrase immediately after the affirmation word. This activity is fast paced, and requires the participants to think and act quickly.

Repeat the activity as described above, but alter the theme of the affirmations. For example, each participant can state a word describing a positive aspect about him/herself. Alternatively the theme can be “school”, in which positive aspects of the school are rhythmically articulated. The participants can offer their own themes or ideas.

## **Objectives**

This activity offers the opportunity to spontaneously elicit positive expressions, serving to enhance the self-concept of participants. Individuals feel validated and accepted when they receive such affirmations from other group members. Adolescents seldom have the opportunity to celebrate their own positive attributes. Society prevents such behaviour, and labels it as: “bragging” or “boasting”. However, self-affirmation is vital to the healthy development of an adolescent’s sense of self. Furthermore, this activity allows for any aspect of daily life, such as school, to be reconsidered in a positive light, promoting adaptive perceptions and attitudes.

### **5. Ritual Closing**

#### **A Journey**

Facilitate the journey with the group back over the hills and through the valleys. Allow the crescendos and decrescendos to evolve naturally within the music. Upon arrival thank all the participants for their participation.

## Workshop Three

### “Our Village, Our Home”

#### 1. Ritual opening

##### Welcome!

Instruct all the participants to wait outside the drumming room and enter only when they hear the “waka waka” call. When the group provides an accurate response to the call, they will be allowed to enter the room, and to take a seat at the drum. The facilitator should wait until all the participants are playing the “eh eh” response in time, on their drums. Allow for the call and response rhythm to continue for a few moments. The facilitator can then choose a participant, and ask the rest of the group to welcome him/her into the circle by chanting his/her name rhythmically while simultaneously playing the beat on their drums. Allow the chosen participant to walk around the circle and shake the other participants’ hands. When the first participant has been acknowledged by all the participants in the group, the group member may return to his/her set, while the participant to the left enters into the circle. Continue like this until each member has been welcomed into the drum circle.

#### 2. Play Together, Stay Together

##### Group Drumming Exercise

The facilitator can explain to the participants that the next activity will allow the group to “tune in” with one another. Elicit ideas from the group about what they think “tuned in” with another implies. The group may determine that this may refer to a state of common or shared understanding, an empathetic togetherness or a connection between individuals. Explain to the participants that they will be putting these ideas into action with an exercise designed to assist the group with connecting and positively interacting with one another.

Invite one of the participants to start the activity. Explain to the participant that he/she will begin by expressing something on the drum – a feeling, a state of being or a musical idea. Anything that reflects his/her state of being at that moment. The rest of the participants in

the group will then have the opportunity to reflect this expression back. The inventor of the expression will repeat it as necessary, making sure that everyone is able to reflect or mirror it accurately. The accuracy is important in terms of tone colour, dynamics, tempo and overall mood of the expression, and not so much in terms of rhythmical and technical precision. The participant to the left of the first, will then have the chance to express something that is relevant to him/her at that moment. This expression will also be matched by each member of the circle. The exercise will continue similarly, until all the participants has had the opportunity to share his/her social/emotional/musical expression and have it matched back or reflected back by the rest of the group (Friedman, 2000).

### **Objectives**

This exercise assists group members to effectively become “tuned in” with one another. The activity is modelled after the counselling technique, active listening. In the context of counselling the term refers specifically to listening (without judgement or question) and hearing what an individual is actually saying (verbally and non-verbally). Deep understanding or empathy is then conveyed through an accurate reflection (verbal or non-verbal) of what the person has expressed. There is great therapeutic value in the experience of being heard, understood and accepted (validated). Through this exercise, each participant is awarded an equivalent and unique voice, and furthermore, each expression is affirmed by the other group members.

The activity promotes sensitivity to non-verbal communication and expression. Participants practise sensitivity and empathy as they attempt to grasp and match the expression of each participant. Conflicts and tension may be resolved as feelings are shared openly and appropriately. Feelings of harmony and an enhanced sense of community and group cohesion may be nurtured.

### **3. The Web of Life**

#### **Have a ball**

The facilitator instructs the participants to all place their drums behind them. The facilitator hands a ball of string to a participant in the circle, and explain to them that they will each

introduce themselves with a short sentence (for example, “my name is wonderful” or “I am Lucy”). The first participant places the ball of string under his/her foot. After the first participant has made a statement about him/herself, he or she rolls the ball of string on to another participant in the circle. This pattern continues until all the participants have had a chance, and the ball of string is in the form of a web joining each participant of the group. Ask the participants to lift the web into the air, creating a vivid visual metaphor of togetherness and harmony (Kalani, 2005).

When the exercise has been completed, ask the participants whether they will be willing to do some homework over the next week. Ask the participants to take note or remember any positive incidents or good things that they notice about themselves (for example, “I am a caring person” or “I can tell good jokes and make my friends laugh”). Ask the participants to write these down, in order to use in the next workshop, when this game will be played again.

### **Objectives**

The objectives of this activity is to give each participant the opportunity to make an affirmative statement about the self (or another person in the group). Such self-statements help promote the sense of self of the group members. Participants further learn something significant about each other as they receive validation from the group.

## **4. Ubuntu Beats: Home is where the heart is**

### **The Heartbeat rhythm**

The facilitator explains to the group that the simplest rhythm to play together is called the “heartbeat” rhythm. The facilitator demonstrates the steady taa taa taa taa on his/her drum. Briefly discuss the nature of the human heartbeat with the group; it is steady and even, without major variations in tempo and dynamics. It is further not very loud, and has a moderate walking tempo. Instruct the participants to sit comfortably with their djembe drums between their knees. The facilitator may instruct them to close their eyes to avoid becoming distracted. Invite one of the group members to initiate a rhythm, and then allow the rest of the group to follow. A group rhythm will soon emerge. If the group has difficulty

remaining together in the beat, assist them by playing on another instrument, such as a xylophone or cowbell. The group's rhythm will probably gradually increase in tempo. Explain to the group that despite the fact that the heartbeat rhythm appears to be very simple, it is actually very difficult to play and stay together in the heartbeat rhythm, and the mastery of this rhythm takes practice. The facilitator can allow the group to repeat this exercise several times, and the group may be able to keep a steady rhythm for a longer period each time. The longer a steady rhythm can be sustained, the greater the relaxation and concentration advantages of this exercise (Friedman, 2000).

### **Objectives**

The first objective of this exercise is to introduce the group to the essential, inner rhythm, fundamental to life (the heartbeat). The participants will realise that this rhythm is inherently their own, something that needs to be brought out and nurtured. This activity further practices participants' capacity to keep a steady pulse. A steady pulse is fundamental to all rhythmical activities, and a group with a firm sense of pulse will find it easier to stay together as a group, as they progress to more complex rhythms. A good sense of rhythm further grounds the group within the beat, and gives them the opportunity to improvise and explore their creativity. The heartbeat rhythm is further considered by music therapists and drumming facilitators to be one of the most healing and restorative rhythms to play on the drum. A sense of being "grounded" in the beat may transfer to a psychological state of stability and increased awareness. The rhythm further aids concentration whilst reducing stress and promoting relaxation.

## **5. Village Gathering**

### **Tempo, Pitch and Dynamics**

The facilitator starts this activity by introducing the free rumble. This is a dynamic tool which has the power to acquaint the group with the major elements of music, tempo, pitch and dynamics. The participants may be allowed to use the free rumble to explore the dynamics of loud and soft, fast and slow and high and low. The facilitator can explain to the group how a high and a low tone can be produced on the drum. Once the group understands and can apply these dynamics, the facilitator stands up and introduces the various sets of body

language that he/she will be using to facilitate the different musical expressions. To facilitate soft drumming the facilitator keeps his/her arms close to his/her sides. The higher the facilitator raises his/her hands, the louder the participants should play. Arms raised vertically indicates very loud playing, and arms flat against the sides indicates silence.

Facilitating pitch indicates pointing into the air for high notes, and to the ground for low sounds. The facilitator should ensure that these signals are clear and simple for the group to interpret. Lastly, the facilitator should guide the group's tempo with clear exaggerated stepping motions. The facilitator should start the stepping at a moderate pace until the group synchronizes. The steps can gradually increase, and the drummers should automatically increase their tempo to match that of the facilitator. Correspondingly, as the facilitator makes his/her steps slower and heavier, the group should slow down. Running on the spot would then call for extremely fast playing (almost a rumble), and a total stop will request silence. The facilitator can use these signals to guide the group's playing for a few minutes. Interesting rhythms and drumming patterns can be created by combining the dynamics of loud, soft, high, low and fast and slow.

## **Objectives**

The three fundamental elements are introduced in this exercise – tempo, pitch and dynamics. Participants further discover the djembe drum's range of expression (various sounds that can be produced on the drum). Various techniques to produce these sounds are further uncovered and practised. The participants are lastly introduced to body language as a way of facilitating a drum circle. Participants start to understand the importance of carefully watching the facilitator's movements and gestures. This is further practise in focus and concentration.

## **6. Ritual Closing**

### **A Journey**

Facilitate the group's journey back over the hills and valleys. The crescendo's and decrescendo's should evolve naturally with the music. When the group arrives back, thank them all for their participation.

## **Workshop Four**

### **“Our Village, Our Home”**

#### **1. Ritual opening**

##### **Welcome!**

The same procedure is used as described in Workshop Two and Three. The “waka waka” call will contribute in assembling, seating and gaining the participants’ attention. Also repeat the group handshakes, and the rhythmic playing and chanting of members’ names. These will assist in defining the drum circle space, mark the start of a new session, and create a sense of belonging.

#### **2. The Web of Life**

##### **Have a ball**

Repeat exercise 6 of Workshop One, and use some ideas of the participants.

#### **3. Born to belong**

##### **Affirmations**

The facilitator discusses the rhythm that naturally exist in words and phrases. Remind participants how they have already found rhythms for their names. Ask for a volunteer to find the rhythm in a specific sentence. The facilitator can guide the volunteer, by playing one beat for each syllable, and placing an accent on the dominant syllables. The natural rhythm should emerge logically from this. Explain to the group that there may be a variety of rhythm options for a single verbal phrase, but there are usually one or two distinct rhythm patterns that are obvious. Once the participant has found the complimentary rhythmic pattern, give the group the opportunity to repeat it several times on their drums while saying the words. Give other participants the opportunity to rhythms on different affirmations. The following are options which can be used (Friedman, 2000):

I am good enough

I am powerful, wise and strong

I love myself exactly as I am

I accept myself exactly as I am

I am a great success

I forgive myself

I am a drummer – powerful and strong

After each of the participants has had a turn, allow them to create their own positive statements. Request that they think about things that they most admire about themselves and each other. The facilitator may guide the group by suggesting ordinary situations, such as being at school, on the sports field, with friends, or at home. Positive statements created by the group members themselves will be most meaningful, and also most influential. Guide the group into joining in, after one participant has offered an affirmation, and this further validate each member's personal affirmation (Friedman, 2000).

## **Objectives**

Reinforcement and internalisation are being promoted by drumming out the rhythms of affirmations (Friedman, 2000). The affirmations may include positive self-statements, which may contribute in the promotion of self-esteem.

### **4. Family Ties**

#### **Expression and Validation**

The facilitator organises the participants in a circle with their djembe drums in front of them. The next exercise involves each participant "saying" something to the group, using their drums. The musical statement can be either soft pattering or loud hammering, it could be a rhythmic pattern or a series of fast or slow, loud, soft, high or low tones. Once a participant has "said" something to the group, the group should echo their expression as accurately as possible. The facilitator should give each participant which offers a statement

a chance to experience the call-and-response cycles, and let the statement repeat a few times. Continue around the group, and give the members ample opportunity to facilitate self-expression.

## **Objectives**

Appropriate and creative self-expression is encouraged as each participant reflects an aspect of him/herself in a supportive and accepting environment. Concurrently, the exercise promotes sensitivity, empathy, peer reinforcement and validation from participants listening to, and mirroring the expression. The call-and-response technique offers an exceptionally effective dialogue tool which can empower participants to ‘have their say’ in the group. They experience, being listened to, and having their own voices count. As the group sensitively echoes the expression of each child (in terms of dynamics, tempo, rhythm, etc.), the individual’s contribution is effectively acknowledged. Musical memory is further practised, as participants learn and repeat each other’s rhythmic motives. The second part of the activity enables participants’ sense of pulse and phrasing is practised, as they have to maintain a steady, coherent, rhythmical progression.

### **5. Ubuntu Beats: Home is where the heart is**

#### **The Relationship-Heartbeat Rhythm**

The facilitator allows the participants to remain seated with their djembe drums, in a circle. Assist the participants to form pairs, and let every two adjacent pairs turn to each other, so that they are facing each other. Explain to them that one pair at a time will be practising the heartbeat rhythm. Emphasize to the group that it is vital for the other participants to remain quiet and listen carefully to the drumming pair that is currently playing.

The facilitator chooses one couple in order to demonstrate the process. Guide the pair, and preferably the entire group, to breathe deep and evenly. Those who wish to close their eyes may do so. Suggest that one participant begins by playing a moderate and steady heartbeat rhythm, and that the rest of the group should first listen, try and “connect” with the pulse, and then fall in when they feel comfortable. Explain to the group that they should aim to sound as though one person were playing the drum. Encourage the group to try and maintain a steady beat for as long as possible. The facilitator may add an additional drum or

other percussion instrument to steady the pulse, should the group begin to accelerate or become unsure of the pulse.

This exercise is relatively unstructured, and therefore requires a high effort in terms of rhythmic sureness, focus, self-control and a degree of calmness. Therefore, it may be advisable to facilitate this in shorter segments. The facilitator can allow each pair to practise for thirty seconds, during which time the facilitator can use a time-keeping instrument to steady their pulse, if it should be necessary. Afterwards, each pair can try and play for a full minute, during which time they will try and stabilise their own and each other's playing. The aim is to determine whether a pair can reach a sixty second mark with a moderate, controlled pulse (Friedman, 2000).

### **Objectives**

The primary objective of this activity is to induce a relaxed, meditative state of mind. The repetitive nature of the drumming brings a sense of calm, as the participants' heartbeats and breathing patterns become increasingly even. As the participants share with one another through shared pulse, they also connect in a very fundamental way. The technique is effective in assisting a group and participants to become more in tune with each other. An awareness of the other participants' musical process is created, and the intimate non-verbal communication and sustained cooperation that is required, makes this exercise exceptional in collaborative teamwork. Further, concentration and focus are also enhanced as participants need to remain attentive to each other's playing.

## **6. Village Gathering**

### **Tempo, Pitch and Dynamics**

Remind participants about activity 5 of the previous workshop, and lead the group in revision of the exercise. Once the group is comfortable with the three physical cues, invite each of the participants to lead and facilitate the group for a few minutes. Encourage participants to pay close attention to the movements of the leader as they attempt to follow his/her signals.

## **Objectives**

This exercise develops leadership skills, as each member gets the opportunity to take the role of the facilitator. Shyness and anxiety usually falls away quickly as the facilitating participant hears the vibrant sounds that he or she is helping to create. This activity is particularly valuable for participants who seldom receive the attention of others, or who shy away from social interaction. These individuals experience being listened and responded to in a setting that is positive and non-judgmental. Participants feel validated and accepted when responded to in this way. The musical elements of dynamics, pitch and tempo are fully understood and internalised when coupled with physical movement.

## **7. Ritual Closing**

### **A Journey**

Facilitate the group's journey back over the hills and through the valleys. Let the crescendos and decrescendos evolve naturally with the music.

## **Workshop Five**

### **“The Rhythm of life”**

#### **1. Ritual Opening**

##### **Welcome**

Use the same procedure as described in Workshop Two. This process facilitates the definition of the drum circle space, mark the beginning of a new session, and create a sense of belonging.

#### **2. What goes around comes around**

##### **The Egg-Shaker Pass**

For this activity the participants must place their djembe drums behind their chairs. Ask the participants to sit on the floor, in a clear circle formation. They should be placed close enough to each other, so that they can be able to hold hands.

Hand a egg-shaker to each child. Ask them to place it in their left hand, and place it on the palm of the hand, with the palm facing upwards. The facilitator should explain that it is important that everybody holds the egg in the same way. Explain the process to them, while simultaneously demonstrating slowly and clearly. Direct the group to lift their right hand and place that hand over the egg (which is held in the left hand). Wait until everyone in the group is cupping the egg with their right hands. Instruct them to slowly pick up the egg with their right hand, and carry the egg over to their right side, and place it in the left hand of the participant sitting on their right. The participant sitting to the left should have their left hand open and facing palm up, ready to receive the egg. Slowly repeat the sequence with the group, whilst making clear statements such as: “hold your egg...pick it up slowly...put it down...” it is essential that each participant performs each step exactly at the same time. This is because the collective placing of the eggs into the next members’ hands creates the satisfying percussive sound which, when occurring at regular intervals, will form a steady beat.

As the group begins to grasp the flow of this exercise, a group pulse will emerge as the eggs are passed from one participant to the other. Once this rhythm has become solid, introduce the words, “goes around, comes around” (one word per beat) in order to form regular, four beat measures. The short phrase should be said rhythmically, and will help to strengthen the group’s rhythm. When the group has mastered this activity, they might want to experiment by increasing the tempo. Participants usually enjoy this activity tremendously when the eggs are orbiting very quickly, and the rhythm begins to disintegrate completely (Kalani, 2004).

### **Objectives**

The primary objective of this activity is to have fun. It may also be used as an ice-breaker, or may be used when the group feels anxious or stressed. Participants are encouraged, in a playful way, to work together toward a common end, which is a steady pulse. This shared objective is intrinsically motivating, as no one needs to be told that it is fun to find a common rhythm, and everyone understands when it falls apart. A strong sense of pulse is also internalised as participants listen and move in order to find and maintain it.

### **3. Move It or Lose It**

#### **Accent jumps and accent stomps**

The group remains in the drum circle. The facilitator explains to the group that they are going to explore the relationship between sound and movement. The group will learn two signals, which they can use, when facilitating the group themselves. Introduce the “accent jump” by jumping in the air and indicating to the group that they should hit their drums as your feet hit the floor. The facilitator can repeat this a few times to check that the entire group should hit their drums simultaneously as your feet hit the floor. The facilitator can then space his/her jumps more equally, so that a solid beat develops. Thereafter the facilitator can experiment with creating different rhythmic patterns with the group by varying the timing of the jumps. Accent jumps can be particularly effective to indicate the accents in a rhythmic phrase.

Next, the facilitator can introduce the “accent stomp”. The facilitator should take clear, heavy, march-like steps. Guide the group to follow your footsteps as they should play a strong beat on their drums each time your foot hits the floor. Carry on, walking “on the spot” for a few moments and subtly change the tempo and metre of the movements. Accent stomps are helpful in illustrating and facilitating syncopated rhythms, which consist of quick and irregular spaced accents. When the group understands these two signals well, give each participant the opportunity to facilitate the new techniques. Assist the group in following accurately to assist the facilitator’s efforts (Hull, 1998).

### **Objectives**

This exercise demonstrates the close connection between movement and sound. A thorough conceptualisation of the accent is gained through visual, kinaesthetic and auditory associations. Further, leadership qualities are developed as participants take turns in providing cues for the group to follow.

## **4. Rhythms of the Universe**

### **The Cosmic Orchestra**

This activity is an adaptation of Friedman’s “Scat Orchestra” exercise (Friedman, 2000). Instead of using scat or nonsense words, this activity will use words and phrases depicting natural, cosmic rhythms. Words and phrases, and the rhythms inherent in these, offer an ideal means of acquainting participants with their own, inherent rhythmic capabilities. This activity introduces various rhythmic patterns, as well as polyrhythms in an enjoyable, non-technical way. The concept of polyrhythmic music is introduced in a natural, accessible manner.

Ask the participants to think of and suggest natural rhythms that structure the continuous flow of time that we experience as life. Many of these rhythms arise from the steady movements of planet Earth and the surrounding heavenly bodies. Examples of these are the division of time into night and day, months and years and the four seasons. Interesting rhythmic patterns and polyrhythms can be created by using words and phrases relating to these natural rhythms.

The facilitator can make a list of words or short phrases, prior to the workshop, that relate to such natural rhythms. These words may depict the heavenly bodies, such as “sun”, “moon”, “earth”, or descriptive words describing the motions resulting in these rhythms, such as “spin”, “orbit”, “rotate”, also the result of these rhythms, “time”, “day”, “night”, “seasons”, “Summer”, “Autumn”, etc. The facilitator can select a variety of individual words and combination of words, making sure that all the words and phrases can potentially fit into four-beat measures. These words and phrases can be written on small pieces of paper, which are folded up and placed into a box. There should be enough pieces of paper for each participant.

### *Round one*

Participants should be seated at their djembe drums in a circle. Hand out a piece of paper to each participant. Ask each participant to read out their word or phrase, assisting them if necessary to articulate as rhythmically as possible. Next, one participant is designated as the starting point of the circle. Explain to the group that the first participant will state his/her phrase clearly and rhythmically, after which the child on the left will say his/her phrase in a similar manner. Emphasize to the group that the aim of the exercise is to go around the circle as many times as possible without skipping a beat. Next transfer the activity to the djembe drums, allowing the participants to play their patterns on the drums while continuing to chant their words or phrases. A fair amount of practise may be required before a steady beat emerges. Should the group not find the activity sufficiently challenging, the facilitator can encourage them to gradually increase their tempo.

### *Round two*

The next step is to return to the designated starting point of the circle. Just like in round one, the first participant says his or her word or rhythm. In this round however, when the participant to the left of the first starts to say his/her word or rhythm, the first participant must continue to say (and later play on his/her djembe drum) his/her rhythmic pattern. As each participant to the left adds his or her rhythm, the prior members must continue to say (or play) their own rhythms, until all members have joined in the unique composition. As in round one, this activity should be performed first by using spoken phrases, and thereafter

adding accompanying rhythms on the djembe drums. As all the words used are similarly structured, a dominant beat will become increasingly clear. If the group's underlying beat is fragile or irregular, the facilitator may support it by adding a steady beat on a percussion instrument. Allow the group to enjoy their joint composition for a few minutes. Should round two of the activity be too fast-paced for the group, or some of the participants, allow each participant to state his/her rhythm two to four times before the next participant adds his or her pattern. The various rhythms will thus be layered in more gradually (Friedman, 2000).

### **Objectives**

This activity encourages participants to think about rhythm as something that exists in the physical world. It is a natural and inherent part of the world around us. Rhythmic activity merely tap into the vast source of rhythm which is the universe. Round one of the activity enhances participants' sense of pulse as they attempt to create a steady sequence of rhythms out of their individual patterns of beats. Round two is an informal and accessible introduction to the creation of polyrhythms. The rhythm played by each participant is supported by a corresponding verbal phrase and is continuously repeated. This makes it easier for the group to stay together in their rhythmic diversity. Lastly, teamwork is encouraged as everyone needs to work in close cooperation to create music that is coherent and enjoyable.

### **5. Ubuntu beat**

#### **Entrainment exercise**

Have the participants sit in a circle with their djembe drums, and explain to them that the group will now be engaging in a relaxation exercise. Explain to them that they will be paying careful attention to their breathing. The facilitator will lead the group into breathing slowly and deeply, and then drumming will follow according to this pattern of inhalation and exhalation. Describe to them that the facilitator will start breathing deeply and evenly. Every time you exhale, beat once on the drum. Facilitate the group into following your actions. the facilitator should visibly exaggerate his/her inhalation, encouraging the group to take a slow, deep breath with you, guide the group into playing one beat on their drums as they

exhale (the facilitator should exhale in an exaggerated fashion, so that the group is able to follow his/her breathing). When the group understands the exercise, invite them to continue with it for approximately a minute. It is helpful to set an alarm for this activity. In this way, everyone can relax and focus on the rhythm being created.

Subsequently, the facilitator can guide the group (with clear breathing motions and other gestures) into playing one beat on every inhalation, and one beat on every exhalation. Continue in this way for approximately one minute. Congratulate the group on their focused participation, and ask them if they would be willing to repeat the exercise for another minute or more. Variations of this exercise may be introduced, such as playing two steady beats on each inhalation, and two on each exhalation. The longer the duration of this activity, the more psychological benefits will result (Friedman, 2000).

## **Objectives**

The primary purpose of this activity is mental relaxation, however physical relaxation is also introduced. The focus that is placed on the breathing and the steady, rhythmic playing of the djembes promotes a calming, meditative state of mind. Body and mind are entrained to the slow, steady rhythm, regulating brainwaves, and in the process counteracting the negative effects of stress, anxiety and anger. Participants' auditory awareness are increased as they focus on their breathing and the accompanying drumbeats. Internal, personal awareness (of their own breathing and playing) and external, social awareness (of the playing of the rest of the group) are promoted.

## **6. Ritual closing**

### **A Journey**

Allow the group to make the journey back over the hills and through the valleys. Allow the crescendos and decrescendos to evolve naturally within the music. Upon arrival, thank all the participants for their participation.

## **Workshop Six**

### **“The Rhythm of life”**

#### **1. Ritual Opening**

##### **Welcome**

Use the same procedure as the opening of Workshop Two.

#### **2. What goes around comes around**

##### **The Egg-Shaker Pass**

Refer to exercise 2 of Workshop Five for the procedures and objectives of this activity.

#### **3. Move to the Groove**

##### **Beat my Feet**

The facilitator can organise the participants into a circle. Involve them in a discussion about the unlimited amount of rhythm and music that is contained in their own bodies (examples are the beating of their hearts, their breathing in and out, sleeping and waking, etc.) as well as the extraordinary range of movements and gestures that the body is capable of performing. The facilitator can now allow the participants to explore the movements their bodies are capable of. The facilitator can step into the middle of the circle and walk, march, skip, step and dance to any musical beat. Allow participants to play the rhythmical equivalent on their drums. The rhythmic patterns do not have to match the movements exactly – their music will be their own interpretation and exploration of the facilitator’s movements. The facilitator can experiment and step with different rhythmical patterns, and end with a steady pulse. This will assist the group in playing together, in addition to exploring their own creativity. This will result in a joint composition of a unique piece of in-the-moment music.

During the next phase, turn the compositional process around, by asking one or two participants to create a beat to which the facilitator will add physical movements. The beat of the one or two participants steadies, the rest of the group can join in.

After the facilitator has demonstrated how music (rhythm) and movements are vitally connected, and mutually inspirational, allow the group to facilitate the process. The role of solo performer can move around the circle. This will give each participant the opportunity to physically interpret and facilitate the composition of the group's music.

### **Objectives**

This activity offers participants the opportunity to generate rhythmical patterns and musical ideas from movement. Children and adolescents, and especially these from African origins love to dance, as it is a familiar medium of socialisation and expression. This exercise may assist in the unleashing of latent musical ideas, and support adolescents to access their inner rhythmic abilities. Because of the strong connection between music and dance in the African cultures, participants may be exceptionally responsive to this lively method of music making.

This exercise further enhances participants' awareness of one another's body language and of the close connection between music and movement. Music and rhythm can be understood as phenomena inherent in human beings, and not something "out there" that should be learned or otherwise acquired. Rhythmic ability and appreciation are effectively internalised.

## **4. Rhythms of the universe**

### **Clapping to Drumming**

In principle this exercise is similar to Exercise 6, "Rhythms of the Universe", The Cosmic Orchestra, in Workshop Five. Instead of using the voice, this exercise employs the hands. Hand-clapping is the oldest form of percussion and can be used to great effect in a rhythm game. The facilitator starts the game by clapping various rhythmic patterns (derived from words or phrases) to the group, who must respond by clapping the patterns back at the facilitator. The facilitator should have words and combinations of words ready, written down on small cards. The "rhythms of life" theme can be continued by making use of phrases pertaining to natural rhythms (examples are, "heart", "heartbeat", "walking",

“dancing”). The words and phrases should be of a similar structure – fitting into a 4/4 time signature.

In the next phase of the game, the facilitator hands one card to each member of the drum circle. The facilitator assists each participant by finding a clapping rhythm that corresponds to the verbal word or phrase on his/her card. The various clapping rhythms will form coherent polyrhythms when played together. It may be helpful to the group to have one member playing a steady rhythm on a drum to maintain the underlying pulse. Suggest to the participants that they can close their eyes while playing in order to fully experience the polyrhythmic music being created. Lastly, repeat the entire procedure, as described above, but this time using djembe drums instead of clapping (adapted from Friedman, 2000).

### **Objectives**

The aim of this activity is to promote group coherence and teamwork. Each participant adds a unique part to the group’s rhythm song, and the combination of all the parts results in a unique in-the-moment composition. If only one participant should not join in the group’s efforts, the entire process can be derailed. The merging of the individual rhythms into a complex composition that is aesthetically appealing is further metaphorical for the social processes of diversity, integration and unity.

## **5. Ubuntu Beat**

### **Entrainment Exercise**

The facilitator explains to the group that the next exercise is a breathing and relaxation exercise that is similar to the relaxation exercise in the previous workshop. The group will again be focusing on deep, even breathing, and coordinating their inhalation and exhalation with the steady rhythms of the drums. Each participant will have the opportunity to focus on the partner’s breathing, and attempt to match it on the drum. Help the participants to organize themselves and the djembe drums, so that pairs are facing each other. The facilitator can choose one pair to help him/her demonstrate the activity. The pair can decide amongst themselves who will be the first to drum, while paying attention to their partner’s breathing pattern.

The facilitator can guide the participant that will do the breathing to sit comfortably, closing his/her eyes, inhaling deeply, and exhaling slowly. Encourage the participant playing the drum to pay close attention to the other's patterns of inhalation and exhalation. Suggest that the drummer play one beat on each of his/her exhalations wait until the breathing and the drumming become synchronised, resulting in a steady pulse, and deep, even breathing. Allow the pairs to continue for approximately one minute.

The next step in the exercise is that the drummer plays one beat on a inhalation, and another beat on the exhalation. Tell the pairs to continue in this fashion for at least one minute. The last variation for this exercise is that the drummer plays two even beats for each inhalation, and another two for each exhalation. The longer the participants can continue with activity, the greater the physical and psychological benefits. Participants must also be given the opportunity to alternate roles, so that each has the experience of being the drummer and of being entrained to the drumbeat (Friedman, 2000).

### **Objectives**

This activity is useful for mental and physical relaxation, and the calm, meditative state of mind induced can be beneficial with the management of stress, anger, and anxiety. The participant being entrained, experiences enhanced internal and external awareness as he or she becomes increasingly attuned to his or her own breathing and the drumming of his or her partner respectively. The participant that is the drummer develops an internal awareness (of the steady pulse he or she is keeping) and an external awareness (of the partner's breathing). This exercise is ideal for participants who have a weak or fragile awareness of the self and/or others in the environment, the rhythmic connection between the participants during this exercise may effectively serve o strengthen their contact functions.

## 6. Ritual Closing

### **A Journey**

Facilitate the journey back over the hills and through the valleys. Allow the crescendos and decrescendos to evolve naturally within the music. Thank all the members for their participation, upon arrival.

## Workshop Seven

### “A Day and a Night in the Village”

#### 1. Ritual Opening

##### Welcome

Use the same procedure as described in the opening of Workshop Two.

#### 2. Playtime

##### Rumble Ball

Instruct the participants to seat themselves in a drum circle, but suggest that they spread themselves out a little and thus leave a larger open space in the middle. The facilitator walks into the centre of the circle with a medium sized soft, bouncy ball, and plays with it by bouncing, tossing and rolling it. The facilitator then asks the group to think of descriptive words for the three different actions (bouncing, tossing, and rolling). Examples for bouncing could be, “thumping”, “sudden” or “fast”. Words for tossing could be, “soft”, “high” and “gentle”, and rolling could be “long”, “slow”, or “low”. The facilitator can then ask the group to consider how they can play on their drums according to the descriptive words for each of the ball actions. Suggest to the group to experiment with hard, soft, high, fast, slow, long and sudden drum sounds.

When the group have decided on which drum sounds best match the three modes of ball play, suggest that they accompany the facilitator’s ball-playing with the appropriate “soundtrack” of drumbeats. For example, when the facilitator is bouncing the ball, the group can give a sudden “thump” on their drums each time the ball hits the ground. When the facilitator tosses the ball, let the group make soft pattering sounds while the ball is in the air. When the ball is rolling, the group can make long, smooth, “swooshing” sounds with the palms of their hands against the drumhead. Once the group understands this game well they usually enjoy the effectiveness of the movement/music synchrony. Invite one of the participants to join the facilitator in the centre of the circle with the ball. This will allow the facilitator to bounce, toss and roll the ball to the participant, which quickens the pace of the

activity. When this format has been established, invite another participant to take the place of the facilitator. The facilitator can seat him/herself at one of the participants' drums. The facilitator can decide when to exchange the first participant with another member of the group. Continue in this fashion until all members has had a turn in the middle of the circle.

### **Objectives**

This activity provides participants with a dynamic experience of timbre and tone colour (as well as volume and pitch), in a natural, spontaneous, and non-technical way. Participants are also introduced to the intimate relationship between music/sound and movement. This activity offers the opportunity for the entire group to participate at all times. Full cooperation between the drummers is essential for creating an effective soundtrack to accompany the ball play, and thus promoting teamwork.

### **3. Together in Weather**

#### **Rain**

The facilitator instructs all participants to sit in a circle with their djembe drums. Explain to the group that they are all going to create a thunderstorm. Ask the group to take out their imaginary umbrellas and get ready to make imaginary rain.

Start a discussion with the group about where rain comes from. Agree with the group that rain comes from the sky, and more specifically from the clouds. Ask what brings the clouds? Confirm that winds sweep the clouds through the sky and brings the rain. Lead the group in making "wind" sounds by making sweeping, circular motions with the palms of their hands over the drumheads. Suggest to them that the wind begins to blow stronger and stronger and howls through the trees. Lead them into making circular motions over the head of the drum, but this time also use the fingernails to scratch over the surface.

Suggest to the group that the first drops of rain are beginning to fall, and get the group to all snap their fingers. When the raindrops begin to get bigger and faster, guide the group to pat their thighs. As heavy rains begin to fall, use the fingertips on the drumhead to create the sounds of the gradually more noisy rainfall. When the entire group is settled into the "raindrop" groove, suggest to the group that they create thunder for their storm. Impressive

thunder claps can be produced by a sudden hard slap on the drum. When the slaps of the entire group are produced concurrently, successful thunder sounds can be created. Cue the thunder sounds by calling, “three, two, one, thunder!”, or use large gestures to indicate the thunder claps. Return to “heavy rain” sounds on the drumhead between each crash of thunder. Allow the storm to be in full force for a few moments as the participants experiment with different ways of creating thunder. Remind the group that thunder may be a low rumble, a deafening roar, or a loud clap. Let the musical storm gradually die down. Guide the group into playing heavy rain (fingertips striking the drumheads), softer rain (pat the thighs), and finally, gentle, pattering rain (finger clicking). Let the wind (sweeping hands over the drumhead) return to take the clouds away. Discourage all talking during this activity. Advise the participants to be completely silent (except for the drumming) and encourage them to listen attentively to the sounds that they, together with the group, are creating. Suggest to them that they perform this activity with their eyes closed to reduce distractions and enhance the listening, auditory and imaginative experience (Kalani, 2005).

### **Objectives**

This activity is primarily an exercise in exploring and experimenting with timbre and volume. This is accomplished in a manner that is playful and non-technical. Participants practise careful listening, both to the facilitator’s narration, and to the expressive sounds that they are making. Creativity and lively use of the imagination are promoted. Teamwork and cooperation are naturally facilitated as the group work together to create a vibrant, memorable, musical experience.

### **4. Village Gathering**

#### **Play and Stop**

This activity provides participants with the opportunity to create and improvise their own group rhythms. Earlier activities in the workshops contained mostly structured activities. Activities like “rain” exposed participants to guided improvisation. The first real opportunity for musical creation is offered in this activity. Give participants the space they need to explore their rhythmical abilities, as individuals and as a group. The facilitator will provide

appropriate “play” and “stop” cues, as well as a certain degree of structure for the group to fall back on when and as they need it.

In the first section of free-play, the facilitator will guide the group’s playing with only three body language cues, the play signal, the stop cue, and the stop cut. Allow the group to engage in free improvisation until the facilitator provides them with the “play” and “stop” cues and signals as needed. This will give the group the opportunity to practise responding to these physical cues while exploring their own creativity. If the group struggles to establish themselves in a rhythmical pattern, assist by providing a steady pulse on the drum for as long as needed.

### **Play**

The facilitator starts the group off by calling out, “one, two, three, play”. This establishes a four-beat rhythm for them to continue with. The group should fall into a joint rhythm, playing together on a comfortable pulse.

### **Stop**

Stopping the group requires three phases, getting their attention (the attention cue), preparing them to stop (the stop cue), and then leading them to a neat, simultaneous finish (the stop cut). In order to give the attention call, raise a finger into the air, and do a 360 degree turn in the middle of the circle, connecting with each player. Following this, the facilitator provides the stop cue by crossing his/her arms over their chest and giving them three warning beats by counting aloud, “three, two, one...”. Finally lead the group to a complete stop by calling “stop” on the fourth beat, bringing your arms down in a clear, sweeping motion.

The facilitator steps into the middle of the circle again to facilitate the group’s needs. The facilitator should not over-facilitate, as this could inhibit the group’s creativity and prevent the development of personal and group agency. Provide gentle facilitation as the group’s needs indicate. This is the introduction to the free improvisation, and the group may feel nervous or uncertain about what to do. It may be that the group may need more frequent interventions to guide and contain them.

This activity should be divided into short segments. The first segment requires the facilitator to lead the group into “playing” and “stopping”. Provide one member with a set of claves, which will help the rest of the group to play on the pulse. Emphasize to the group that they should listen to each other, and to the pulse, and the overall music that the group is creating. They should aim to create the most interesting and pleasant music as they can, as a percussion group. The facilitator may use basic signals to guide the group through transition points, steady them in a new beat, or stabilise their pulse. For the second segment of the exercise, the facilitator can give the facilitator role to one of the participants, and give the time-keeping role to another participant. Invite the rest of the group to engage in free play, following the facilitator’s guidance and creatively weaving their own rhythms around the pulse. If the activity is structured in this way, it helps to maintain the group’s interest for a longer period of time. All participants should have a turn to be both facilitator and pulse keeper (Kalani, 2004). (the role of facilitator may be too intimidating for some participants, do not coerce them into the position).

### **Objectives**

This activity can be described as an in-the-moment activity, and it allows the participants to create original music that they can justly call their own. This promotes a sense of agency within the group and among its members. The participants’ musical and social independence is also fostered as they are encouraged to express their own individuality within the group setting. Nothing that they play can be “wrong”, and this offers an ideal climate for musical and personal discovery and expression. Participants have the opportunity to create vibrant, metaphorical, “I-statements”, and to explore and experiment with different “ways of being” as individuals and with one another. Also, everything that is played is supported and guided by the steady pulse of the time-keeper. There is thus always a steady, secure beat to fall back on, should they need to.

This activity is further also a dynamic illustration of social harmony. In a short discussion afterwards, it should be emphasized that each participant was playing something different, and yet everyone’s part sounded good together. The group was held together by a common “heartbeat”. Further, the group’s attention can also be drawn to the fact that when one participant stopped playing for a few moments (which usually happens), one could

immediately hear the difference. This illustrates the significance of every participant's contribution. This informal discourse can be ended by drawing the group's attention to the fact that while each person is unique and different, together they can be something very exciting and interesting.

## **5. Ritual Closing**

### **A Journey**

Allow the group to make the journey back over the hills and through the valleys. Allow the crescendos and decrescendos to evolve naturally within the music. When the group arrives, thank all the members for their participation.

## **Workshop Eight**

### **An African Night**

#### **1. Ritual Opening**

##### **Welcome**

Use the same procedure as described in the opening of Workshop Two.

#### **2. Beneath the Starry Sky**

##### **Froggie Song**

The facilitator can assist the participants to place their chairs and djembe drums out of the way. The participants all form a large circle, and everyone receives a large wooden scraper frog. The facilitator can assist all participants with the correct playing technique. It is important that the frogs are placed upon the players open hand with the palm facing up (it should be placed in the left hand if the participant is right-handed, and on the right hand if the participant is left-handed). If the frog is gripped or held by the sides, the sound will fail to resonate. The sound is further produced most effective when the wooden stick is scraped starting from the bottom to the top of the ridges. The sticks should be held loosely in the hand as it is dragged against the frog's ridged back, as this will prevent the dampening of the sound or the loss of resonance. The participants can then return to the circle, and the facilitator can initiate a discussion about where frogs normally live...near ponds, waterfalls, in marshes, etc. the light in the room can be dimmed, or the curtains drawn. Ask the participants to close their eyes and to imagine themselves under a leaf, besides a pebble or on the water's edge. Further suggest to the participants that they are frogs talking to one another across a small pond. They may use only "ribbet" sounds as they talk to one another.

The facilitator describes the process to the participants as follows. The activity starts with a moment of complete silence. One participant opens the song with soft "ribbeting", or gentle scraping of the frog across the ridges of its back. Suggest to the group that one participant at a time should enter the song. This should be a gradual process. Encourage the group to listen to the individual frog calls and to the frog-pond dialogue that is slowly emerging.

Gradually the frog dialogue should develop into a groove of its own. Suggest to the group that they should experience the changes in texture and volume as each of the frogs is layered into the music. Encourage them to listen to the whole song, as well as to what each of them are playing, and to contribute a part that adds beauty and interest to the group composition. Explain to them that they need not play all the time, but they can layer their instruments in and out of the composition, in order to experiment with timbre, tone colour, texture, volume, etc. Allow the participants time to listen, play and fully experience the music being created around them. The music should eventually, naturally come to a close. Guide one participant at a time to stop playing, or simply fade out the entire group until there is complete silence.

Encourage the group to pay close attention to the “song space” – thus to be aware of where the different sounds are coming from, the balance that is achieved in the group, the overall volume, the quality of the texture, and the musical dynamics that are at play in their improvisation. Questions that can be addressed to the participants can be, “does your own voice fit into the musical conversation, or is it overly loud and dominating, or too soft to be heard?”; “does your part fit in with the rhythm of the piece?”; “does a steady rhythm emerge within the group?”. Allow the group to experiment for a while with the balance and texture of their music (Hull, 2006).

### **Objectives**

This activity represents an exploration of tone colour, timbre, and texture. The participants gain an awareness of how sounds can be patterned, layered, or arranged in different ways on a tonal “canvass”. Although the music is structured spontaneously, the participants still learn a valuable lesson in orchestration. They learn that the overall sound of the composition can be light and transparent, or dense and cluttered. They further learn that certain timbres and rhythms sound better together than others. They also learn that their own contribution can either enhance or spoil the effect being achieved by the group as a whole. Social skills such as listening, thoughtful collaboration and sensitive participation are all enhanced with this activity.

### 3. Fireside Sing-Along

#### Folksongs

The facilitator can assist the group to move back into circle with their djembe drums in front of them. Explain to the group that they will be singing a few African folk songs. Folksongs are usually ideally suited to children and adolescents of all nationalities and ages. When the facilitator introduces the songs, he/she should emphasize the rhythmic patterns that are present. The songs should be taught to the participants, line by line.

The facilitator can start by chanting the words of the first song to the participants. This activity works well if a song with a call-and-response format is used. The facilitator starts by stating the first line of the song rhythmically, and facilitate the group in echoing what has just been called. The facilitator may need to guide the group in their response.

Next the facilitator continues to chant the words while providing a rhythmic accompaniment on his/her drum. Encourage the group to continue reciting the words while they play appropriate beats on their djembe drums. This method will ensure that the members play in unison, even if the volume levels becomes so high that it drowns out their voices. The result will be a highly effective call-and-response composition inspired by the rhythms inherent to the particular song. Folksongs often offer different, interesting and complete rhythmic phrases in each line. When this concept has been mastered, divide the group into two, and allow the one group to play a steady pulse, while the other group plays the rhythm of the song. Afterwards give the two groups the opportunity to exchange roles. The facilitator can also use other songs.

Examples of African songs:

Yoo, Yoo (A Kenyan lullaby)

Nanu, Nanu (An Ethiopian work-song)

Tekele Lomeria (A Kenyan war-song)

## **Objectives**

This exercise demonstrates the intimate connection between rhythm and music. A rhythmic composition is inspired by each folksong, where the participants do not have to learn different rhythms. The call-and-response format provides participants with a non-technical way of ensemble playing. This exercise further offers the opportunity to be exposed to the richness of different cultures.

### **4. Grandmother's story**

#### **Sound Effects**

The facilitator allows the group to sit in a circle at their djembe drums. The facilitator tells a traditional African story. An indigenous folk tale containing words suggestive of interesting sounds works best. The facilitator explains to the group that he/she will narrate the story, but that you will need their help in telling it. The facilitator can explain to the group that the story contains many sounds which the group will have to reproduce on their drums, thus creating a soundtrack to accompany the story. Read the story expressively to the group, providing clear cues as to where they should add sound effects. The facilitator can encourage the group to experiment with various elements of timbre, articulation, tempo, volume, etc. as they attempt to match the story.

A good example of a story to use is, "Why the Sun and Moon Live in the Sky" from African Sky stories: A collection of African Folk Tales (R. Marsh (Ed.), 2008).

#### **Objectives**

This activity offers the opportunity for active listening, as they need to listen to the story and be alert to the sound cues. It is further a playful exercise in the production and exploration of different timbres. Participants are encouraged to be creative and use their imaginations to find different ways of producing various sounds. Participants are also exposed to a different culture and traditions (Kalani, 2004).

## **5. Village Gathering**

### **Lullaby**

This exercise offers the opportunity for guided improvisation. Give the group the theme of the exercise, village lullaby and ask a person in the group to start playing what he/she thinks a lullaby sounds like. Give the rest of the group the opportunity to gradually join in as they create rhythms that (more or less) fit in with the first. Encourage the participants to stay within a gentle, swaying tempo. Allow the music to come to a natural conclusion.

### **Objectives**

This activity gives the group the opportunity to improvise and create music that is truly original. They are encouraged to be original, imaginative, cooperative and collaborative in their attempt to create a lullaby-composition.

## **6. Ritual Closing**

### **A Journey**

Let the group to make the journey back over the hills and through the valleys. Allow the crescendos and decrescendos to evolve naturally with the music. When the group arrives home, thank all the members for their participation.

Adapted from: Flores, K. (2011).

## Appendix J

### OBSERVATIONS OF DRUMMING WORKSHOPS

#### DATA ANALYSIS

##### Session 1

The children were all given a journal, and I explained to them that this journal was their own description of events, as the drum sessions progressed. I asked to write down a phrase/sentence/sentences/paragraph to describe their feelings in terms of the drum circle of which they were part, and that was about to start. They looked around uncertainly, and eventually wrote tentatively in the journals.

The children were asked to sit at the djembe drums, which had been placed in a circle beforehand. I explained to them that they will be visiting an imaginary place, a small village, each time they join the drum circle. I explained to them that, in order to get there, they will have to climb over a steep hill, crawl through a valley, swim across a wide river. I lead the group in pattering the drums with their fingertips. I explained to them that this sound symbolized them tip-toeing down the school corridor, down the steps, and out into the open. The children followed me, and as the journey continued, the finger pattering became soft drumming, and louder drumming (crescendo) to portray the hills. I guided the group in using circular, sweeping motions with hands over the head of the drum, as this sound depicts the sound of rushing water.

The children initially looked at each other with puzzled expressions on their faces, which later turned to smiles on most faces. They did not use their bodies much in the playing of the djembes, sitting fairly rigid, however as the exercise progressed and when the drumming became louder (they participated in the crescendo), they moved around more, and laughed out loudly.



As we “arrived” in the imaginary village, I asked the participants to think of a name for their village. They suggested [REDACTED] (the name of one of the members of the group), and then they suggested Pretville. As a group we decided on Pretville as the name of the village. I suggested to them that we play the name of the village on the djembes. We played the name Pretville in the rhythm: ta-te taa, saying the name rhythmically and increasing the volume (crescendo). The children clearly enjoyed the activity, they smiled, moved around with their upper bodies, and eventually raised their voices and shouted.

I then explained to them that music, but especially rhythm could be found in each of their names. I chose one child in the circle and asked for her name, she said it was [REDACTED]. I asked her to play, and say her name for the rest of the group. She played [REDACTED] in a taa – taa rhythm, very softly. I asked her to repeat it a bit louder, she repeated it, but not much louder, and I asked her to repeat it again. When she played it the third time, it was louder. I explained to them that just as I altered the rhythm of Pretville, instead of playing, taa-taa, I played ta-te - taa, [REDACTED] name could also be used in a different rhythm. I asked her to think of an alternative rhythm to use with her name. She responded with the same rhythm as the one used for Pretville, ta-te-taa. I followed her as she played it, and asked the rest of the group to join in and play along. We repeated the name a few times, each time increasing the volume. I gave the child sitting next to [REDACTED] the opportunity to play his name on a drum. He also repeated the ta-te-taa rhythm, with his name, [REDACTED]. The group then repeated the name a few times, with an increase in volume. We continued around the circle, as each child gave their name, and a rhythm to accompany the name.

I reminded them of the village that we escaped to and told them that we needed a war cry for our village. I used Waka...Waka ....Eh...Eh as an example. I then played Waka...Waka on a tambourine, and the group played Eh..Eh on their drums. I asked them to invent their own war cry, and they suggested Njammie...Njammie, Eh...Eh. I then played Njammie...Njammie on the tambourine, and they played Eh..Eh on their drums. We then changed the order, and the group started with Njammie...Njammie on the drums, and I played Eh..Eh on the tambourine.

I then discussed guidelines with the group, and explained to them that by following guidelines, a group can play well together. I emphasized the word 'play', stating that drums are played and not worked, and the drum sessions could more accurately be described as playshops.

I introduced the following guidelines, to treat each other with respect, to try your best to join in and play along, to listen to the others in the group, play with them and not against them, and to not play on your instrument when someone else was speaking and lastly help one another when he or she is struggling. After introducing a guideline I gave the group the opportunity to discuss the guideline.

Next I explained to the group that one could ask a question and answer that question without using words. I played the rhythm taa-taa-taa, and asked them to try and respond with an answer. There was a silence in the group, and then one answered by verbally saying; "wie is jy?" I responded and said that it is possible that the words may have been "wie is jy?", but for someone else the music might sound like, "where are you?" or "how are you?". The first rhythm I introduced was, taa-taa-taa. I asked them to respond in answer, as a group. The combined response was taa-taa-taa. The second rhythm was taa-ta-te-taa-taa, and the group responded, ta-te-ta-te-taa-taa. The third rhythm was taa-aa – ta-te-ta-te-taa-aa, and the group responded with taa—taa-taa. The last musical question was taa-te-ta-te-taa, and their response was taa-te-ta-te-taa. After the last rhythm I spontaneously started to play different rhythms, and the group responded with answers. The rhythms which they played in response to my rhythms were more musically correct, and not identical replications.

I played a CD with rhythmic music, and demonstrated to the group where to play, without explicitly telling them. It seemed that they enjoyed this activity as they participated actively, playing accurately. There was a technical problem with the CD, and I continued to play without music. This resulted in a “jamming” session where the group and I spontaneously moved between different rhythms, drumming together. They played together very accurately, and the expressions on their faces showed concentration and focus.

We then travelled back from our imaginary village, down the mountain, playing with the fingertips on the rim of the drum, then jumped over the river, I guided them into sweeping movements, then tip-toed through a mountain path – fingertips on the rim of the drum, and then ran down the road, light slap movements moving into a crescendo and I guided them up the road to the school, up the stairs, down the corridor, into their class, and onto a chair. The slapping movements moved into light finger tapping on the rim which moved into a crescendo and one slap to indicate them sitting down on a chair.



I handed out the journals again, and asked them to write down a reflection of their experience of the first drum circle. It seemed that writing in the journals were easier, as they did not look around again, but started writing in the journals immediately.



## DATA ANALYSIS

### Session 2:

The children were very excited before the session started, they were moving around, talking to each other rather restlessly. I told them that we were going to escape to our imaginary village again. While I explained this the children were still talking to each other and moving around restlessly. I started with pattering on the rim of the drum, increasing in volume, crescendo, the pattering changing to soft drumming. Gradually all the children joined in and played together. As I talked them through the journey, “up the mountain, on the little path, up, and higher, over the river...” we changed from soft drumming to louder drumming and sweeping motions to depict the jump over the river, and eventually arriving in the village.

I asked them if they could remember the name of our village, and they immediately replied, “Pretville”, and we spontaneously started to play the name of the village together, the rhythm was, ta-te-ta-te-taa. We played this together, increasing the tempo and volume gradually. The group did not play together, and I stopped them and explained that we were going to play the name 4 x, gradually increasing the tempo and volume, and it was played together more accurately. I then asked them if they could remember the village warcry, they looked around at each other for a few seconds, and then one replied, “njamie-njamie – eh-eh” I played njamie-njamie on the tambourine, and they replied with eh-eh, on their drums. We exchanged, and the group played, njamie-njamie, and I played eh-eh on the drums.

I told them that this session will commence with a welcoming of each member into the drum circle. I invited one of the group members to stand in the middle of the group and tell us what her name is, but use an interesting rhythm. She walked to the middle and gave her name, [REDACTED] (taa-taa), which is not a different rhythm to the normal pronunciation of her name. Her body language was slightly uncertain and her voice was soft and unclear. I played her name on my drum and invited the rest of the group to join in and play her name together. I invited the next member of the group to the middle, and he introduced himself as [REDACTED] (taa-aa – taa), he extended the first syllable from

a crotchet to a minim. I prompted him to change the rhythm more. He leaned slightly forward with his body, and looked uncertain. He replied with, taa-aa-aa-aa-taa, changing the minim to a semibreve. He also added a small hand movement. I played the rhythm on my drum and invited the rest of the group to join in. The next member introduced himself as [REDACTED] and repeated the previous rhythm, taa-aa-aa-aa-taa (semibreve, crotchet), but added a body movement, crossing his hands in front of his body while he said his name in “rap-type” movement. I invited the group to imitate the body movement, while they were sitting, and then played the rhythm, together as a group. The next member introduced himself as [REDACTED], ta – taa-taa-taa-taa-te (quaver, semibreve, quaver), also with a body movement, also a “rap-type” movement. I played the rhythm, and invited the rest of the group to join in. The next member walked forward while clenching her fists, she looked very nervous, and introduced herself as [REDACTED], taa-taa,taa,taa,taa ( 5 crotchets).



I played the rhythm, and invited the rest of the group to join in. The next member of the group stood up and walked to the middle, as she got there she started giggling and turned to her friend. She then turned back to the middle and said her name, [REDACTED], taa-taa-taa-taa-taa (5 crotchets).



She used a body movement while introducing her name. The group first copied the body movement, and I then played the rhythm, and used varied drum techniques to play the 5 crotchet notes. The next member introduced herself as [REDACTED], taa-taa-taa-taa-taa (5 crotchets). I tried to encourage her to use a body movement but she only placed her hand behind her head. I played the rhythm and the group followed. The next member introduced herself as [REDACTED], taa-taa-taa-taa-taa (5 crotchets), and used an interesting, creative body movement with her name. The group copied the body movement, and as a group we played the rhythm together. The next member looked very nervous, she clutched her dress seam, crossed her legs and pulled at her dress while saying her name. she introduced herself as [REDACTED], ta-te-ta-te-taa-aa (4 quavers, minim). She used a body movement which the group imitated, and then played the rhythm together which she introduced. The next member did not use a body movement and also seemed very nervous, and I had to give several examples and possibilities before she used her own example.

She introduced herself as [REDACTED], taa,taa-taa (3 crotchets). The group played it together. The last member did not want to stand up and said, “ek kan nie my naam maak nie”, I replied, “jy het dan so ‘n mooi naam”. She slowly stood up, and as she walked to the middle I explained again that you could alter your name and make certain parts longer, and others shorter, and gave examples.

She said again, “ek kan nie” I decided to give an example and asked her if she wanted to change anything. She accepted the version, and the group imitated the body movement, and then played the rhythm, [REDACTED], ta-te-ta-te-taa (4 quavers and one crotchet). The next member was also fairly nervous and walked to the middle of the circle with clenched fists.



She stood in the middle without giving any suggestions, and after a while I suggested a body movement with her name. she looked around at how the rest of the group received the suggestion and laughed nervously. I asked her if she wanted to change anything, perhaps make one syllable longer, and she said to keep it the same. The group imitated the movement, and then played the rhythm on the drums, [REDACTED], taa-aa, taa (minim, crotchet).

I showed the group 3 techniques to play the drum, the bass slap, the open slap and the muffle slap. I demonstrated each technique, and gave them the opportunity to practise each. We then combined the three slaps, and played four of each, then two of each. The group was then divided into three groups, and each group had to play one slap. I used recorded music, and each group played 16 beats with the music. This cycle repeated three times. The group then played the sequence without music. The expressions on their faces showed concentration and focus while playing.

I asked the group to write in their journals about their experience of the day's drum circle.

## **DATA ANALYSIS**

### **Session 3**

The children were very restless as most of the other children at school were playing outside, or moving around in the corridors (this drum circle took place during the last week of school before the school holiday). We started the session again as I told them that we would escape to our imaginary village, Pretville (named by the participants). We played with our fingertips on the rim of the drum, as we imagined that we tip-toed down the corridor of the school, down the steps and out of the door. I continued to facilitate the journey, and used soft and louder drumming to depict the path we followed over hills, over rivers, and eventually down a hill so reach the village. We then drummed out the name of our village, Pret – ville, taa-aa-taa. We then played the war cry of the village, njammie – njammie, eh – eh, I played njammie – njammie (ta-te, ta-te) on the tambourine, and they echoed eh – eh (taa-taa) on their drums. The group did not play together accurately – there were some children that played too soon, and others too slow. The group then played njammie-njammie, and I echoed eh-eh on the tambourine.

I explained to the group that the workshop today was about being “in – tune” with each other. I discussed with them, what it meant to be “in – tune”, and asked them what they understood about being “in – tune”. One of the group members said – “jy is saam met hulle”. I discussed the term further, explaining that “in-tune” also implied feeling comfortable with that person/group, and the group concluded that it referred to a common understanding or an empathic togetherness between individuals’ way of being or perceiving.

I invited one of the group members to begin the exercise by expressing something to the group – a feeling or a state of being – anything that portrays an aspect of his/her way of being at that moment. Everyone in the circle will then have the opportunity to reflect that idea back on the drums. One of the group members volunteered a sentence, “ek voel excited”. He said it very soft, and I was not sure I heard it correctly, and therefore asked him to repeat it, and he said again, “ek voel excited”. I asked the group to reflect that sentence back to the originator, on their drums. I purposefully played soft to give the group the

chance to reflect this idea. They played the rhythm, taa-taa-ta-taa-te. While they played they looked around at each other, two girls giggled and spoke to each other. I then explained to the group that each of them would now get the opportunity to express a feeling, or state of being, starting with the person sitting next to me. As each member gave their expression, the group had to reflect it twice on their drums, and immediately move on to the next member who would then give their expression, and so on. The first group member said, “ek voel goed vandag” and the group reflected, taa-taa-ta-te-taa. The group repeated this a few times and I had to stop them and repeat the instruction that they only had to play twice and then stop to give the next member the opportunity to continue with his/her expression. The next member said, “ek voel spesiaal”, and the group reflected, taa-taa-ta-te-taa. The group did not play together and I asked them again what it meant to be in-tune with each other, and I explained that it implied that we listen carefully to what our friends said, and how they played on their drums. The next member said, “ek voel aairie” this expression was met with loud laughing, I asked her to repeat the expression again, and the group then reflected, ta-te-ta-te-taa-taa. They repeated this twice, and the next member said, “ek voel oraait”. While she said this she looked down at the drum and stroked the velum of the drum. The group reflected this expression with taa-taa-ta-taa. When it was the next member's turn, she looked at her friend and started laughing, her friend gave a suggestion and she said loudly, “ek gannie dit sê nie”, laughed again, looked up, said, “uhm – uhm”, and then “ek voel happy”. The group reflected this with taa-taa-taa-taa. The group did not play well together, and there was a restless atmosphere among them, they moved around on their seats, touched their hair. The next member said, “ek voel oraait”, and the group reflected, taa-taa-taa-taa. The group played very unrhythmical, and I stopped them and repeated the sentence, “ek voel oraait”, and played the rhythm on the drum for them. They then joined in, and the rhythmic play was more coordinated. The next member said, “ek voel opgewonde”, and the group reflected, taa-taa-taa-taa-aa-taa. The next member expressed, “ek voel joy”, the group reflected, ta-te-taa. The next member said, “ek voel lekker”, the group played, ta-te-ta-te. The next member's expression was “ek is grasgroen” which elicited loud laughter, however they started reflecting on the drums, taa-taa-taa-taa. The last member said, “ek voel sleg vandag”, and the group reflected, taa-taa-taa-taa-taa. They played uncoordinated, and unrhythmical. They looked around and appeared restless.

The group members looked the group member who had said “ek voel sleg vandag” with concern and serious expressions on their faces. I reflected the member’s expression and said that I was happy that he had introduced a negative expression, as this was completely natural, and everyone felt bad at some stage or another, that all people had good feelings and bad feelings, and it was healthy to think about this. I also pointed out that if someone only had bad feelings it was something that was not as healthy.

I asked the group to place their drum behind them and sit down again. I asked them that I wanted them to think about something good or positive about themselves. I gave an example and said, “ek is ‘n hoopvolle mens”. I had a ball of string and said that I would pass the string on to somebody in the group, and that person had to say something positive about themselves, and then pas the string on to another person in the group, an so on. The aim of the exercise was to create a web of positivity. I gave the string to a group member, and she said, “ek voel goed”, and I explained that we had spoken about feelings in the previous exercise and I wanted them to comment on something positive or good about themselves. She looked around and seemed uncertain, and said “ek weet nie”, and then, “ek hou van my oë”. She passed the string on to the next member, and he sat with the string for a while, looking around. It seemed that he enjoyed the attention of the entire group on him. It became very quiet and one or two members giggled, and after about two minutes he said, “ek hou van my smile” he passed the string on to another member, and he said very softly “ek hou van my lippe”. The children laughed loudly, and he gave the string to the member sitting next to him. He fiddled with ball of string and looked at it, and then he said, “ek hou van my hare”. He passed it on, and she said, “ek hou van my oë hare”. She passed it on to another member and he said, “ek is spesiaal”, the group laughed loudly, and one member said, “nee, jy moet iets anders sê”, he then said, “ek hou van my skoene”. I said, “probeer dink aan iets wat aan jou behoort, wat deel is van jouself”, and he said, “ek hou van my voete”. He passed the string on, and the next member said, “ek hou van atletiek”. He passed it on, and the member said, “ek hou van my gap” the children responded surprised, and laughed very loud. He then passed it to another member who sat with the string for a few seconds looking down at the string, and then replied, “ek hou van my knieë”. He passed it to another member who said, “ek hou van my plat oë”. She passed it to the member sitting next to her who fiddled with the string for a few seconds, and then said, “ek hou van my

persoonlikheid". The ball of string was passed on, and the member said, "ek hou van my tone", which also caused loud laughing, and when the last member received the string she said, "ek hou van my ore". I pointed out what a lovely web they had created with positivity and good things about themselves. They sat silent for a while, looking at the web.

I asked them to place their drums in front of them again. I explained to them that one of the simplest rhythms to play was called the "heartbeat" rhythm. I demonstrated the taa-taa-taa-taa on my drum. I briefly discussed the nature of the heartbeat, that it is steady and even without major fluctuations in tempo and dynamics, it is not overly loud and has a moderate, walking tempo. I asked everybody to sit and try to relax, they could close their eyes if they wanted to. I asked one of the group members to initiate the rhythm, and the others to gradually join in. The group did not clam down, and there was still a restless atmosphere, and the children moved around on their seats. One member started and the others joined in uncertainly. The tempo of the rhythm increased, and I stopped them, explaining that the aim of the exercise was to keep the tempo even, and to play together as a group for at least 60 seconds. The aim of this exercise was not reached as the children continued to look around and not play in tempo with each other. However I continued with the steady beat, and it did seem that the group became calmer and started to tune-in to each other.

I introduced the concept of free rumble to them. I described to them that they could now play on their drums as they pleased, using any rhythm or any technique they preferred. I allowed them to explore this concept on their drums, and then explained the dynamics of loud and soft, fast, slow, high and low tone. I said that I was going to stand in the middle of the drumming circle, and if I raised my arms to the side, they should play louder, and as I lowered my arms, they should play softer until my arms were completely against my sides, where they had to stop playing completely. The group was still restless, and I had to wait a few seconds for absolute silence before I could start.

I started raising my arms slowly and they started with the free rumbling on their drums, they increased the volume gradually and when I held my arms out to the sides and they had to play loud, they thoroughly enjoyed the playing as they smiled and concentrated on playing their drums. I asked them if anyone in the group wanted an opportunity to repeat

how I had led the group, and one of the members indicated that he wanted to. The group responded very well to his body movements. I asked if there was anybody else who wanted to stand in the middle, but nobody else volunteered.

We concluded the session by returning from our imaginary village, down the mountain, playing with fingertips on the rim of the drum, then jumped over the river, I guided them into sweeping movements, then tip-toed through a mountain path – fingertips on the rim of the drum, and then ran down the road, light slap movements moving into a crescendo and I guided them up the road to the school, up the stairs, down the corridor, into their class, and onto a chair. The slapping movements moved into light finger tapping on the rim which moved into a crescendo and one slap to indicate them sitting down on a chair.

## **DATA ANALYSIS**

### **Session 4**

We started the session again as I told them that we would escape to our imaginary village, Pretville. We played with our fingertips on the rim of the drum, as we imagined that we tip-toed down the corridor of the school, down the steps and out of the door. I continued to facilitate the journey, and used soft and louder drumming to depict the path we followed over hills, over rivers, and eventually down a hill so reach the village.

I discussed the fact that rhythms existed within words and phrases naturally. I asked them to recall how they found different rhythms for their names. I told them that in the next exercise we were going to use affirmations such as, “ek is super” or “ek is goed genoeg” I started and gave an affirmation, and asked them to reflect it on the drums afterwards. I started with, “ek vergewe myself en laat my verlede gaan”. As this is a long sentence the group found it very difficult to reflect this rhythm together as a group, I played along with the group and attempted to sustain a constant rhythm, but was not successful. I stopped them, said the sentence again, and played it with them, but slower and accentuated. The next sentence was, “ek omarm die nuwe”. The rhythm as a group was not constant, but as they played together, gradually gained some uniformity. I then said, “ek is goed genoeg”. They played this sentence together remarkably well, and I continued with this rhythm for at least 60 seconds. I let them continue with the rhythm and said the next sentence while they kept the constant rhythm. I placed the words so that they fit into the existing rhythm, and changed the rhythm slightly if needed. The next sentence was, “ek is kragtig, slim en wys”. We continued with the constant rhythm, and I introduced the following sentences, “ek voel vrede, ek verdien liefde, ek is ‘n groot sukses, ek vergewe myself, ek is ‘n drommer”. The group chanted together very well, and a feeling of calmness and serenity was felt. We kept on with this constant rhythm for at least 5 minutes.

I explained to the group that in the next exercise they could each have a turn to say something to the group, using their drums, not language. Their musical statement could be soft pattering or loud hammering. What the person said to the group would then be echoed by the group as accurately as possible. I asked the child sitting on my right to start with the

first statement, and he replied verbally, “ek is nuut”. I explained to him that I wanted him to play his statement on his drum. He laughed and looked away embarrassed, and I said, “ek wil graag hê jou drom moet vir ons jou woorde gee”. He played the rhythm, taa-taa-taa on his drum, and the group echoed it. I stopped the group with a hand movement, and pointed to the next child, he looked at me for a few seconds, and then played a very interesting rhythm on his drum, ta-e-fe-ta-e-fe-ta-e-fe, and the group accurately reflected his rhythm. The next child played, ta-e-fe-taa-taa, and the group accurately reflected this rhythm. The following child played ta-te-ta-te-ta-te-taa, and the group also reflected this rhythm accurately. It was clear that there was a sense of focus and concentration in the group that was not present previously. The next child’s rhythm were ta-te-ta-te-ta-te-taa. The following rhythm was ta-te-ta-te. The group did not reflect this rhythm very accurately as the child who introduced it played soft. Eventually the rhythm was ‘heard’ by all the group members, and echoed rhythmically. The next rhythm was complicated, and when repeated it was different to the first, and when she repeated it the third time it also differed from the first and the second rhythms. I started playing and deduced a rhythm from the three rhythms she had played, and the group followed. I tried to communicate with movements during this exercise, and did not make use of any verbal instructions. When it was a person’s turn, I pointed, and when they had to stop I showed them with a hand signal. The next rhythm that was played was taa-ta-te-taa-taa, and was immediately reflected by the group accurately. It seemed that the children were getting tired, as they started to shift around while they were playing. The next rhythm was ta-te-ta-te-taa, and the group also reflected this rhythm accurately. The next rhythm was taa-taa-taa, and the group reflected this rhythm accurately as well. The next child played a simple rhythm, ta-te-ta-te-taa, but introduced a drumming technique where both hands moved gradually to the middle of the drum, whilst playing. The group had some difficulty in repeating this rhythm, but succeeded after the third attempt. The following child’s rhythm was, ta-e-fe-ta-e-fe-ta-te-ta, and the group immediately reflected the complicated rhythm accurately. The following rhythm was ta-te-ta-te-ta-te-ta-te, and the group also reflected this rhythm accurately. The following child introduced the rhythm, taa-taa-taa-taa. As this was a relatively simple rhythm the ‘groove’ was lost as they played this simple rhythm. As we played it I introduced an increase in tempo.

In the next exercise the group members had to form pairs and turn and face each other. I asked one of the members to sit and face me, and I demonstrated to the group that one member of the pair had to breathe in and out slowly, and the other member had to play on the drum only when the other person breathed out. The group followed the instructions and the one half started playing when the others breathed out. Gradually the group synchronized, and one drum slap was heard. The pairs then switched over, and the other member had to breathe while the drumbeat accompanied the breathing out. It seemed as if the children were becoming tired as they moved around again and looked around. Lastly they had to breathe together as a pair, and play together on the drums, as they breathed out together.

We ended with an affirmation that we said together as a group: “You belong, I belong”. The group free rumbled while saying the affirmation, and the rhythm and synchronization was good. This continued for at least 5 minutes.

We concluded the session by returning from our imaginary village, down the mountain, playing with fingertips on the rim of the drum, then jumped over the river, I guided them into sweeping movements, then tip-toed through a mountain path – fingertips on the rim of the drum, and then ran down the road, light slap movements moving into a crescendo and I guided them up the road to the school, up the stairs, down the corridor, into their class, and onto a chair. The slapping movements moved into light finger tapping on the rim which moved into a crescendo and one slap to indicate them sitting down on a chair.

## **DATA ANALYSIS**

### **Session 5**

We started the session again as I told them that we would escape to our imaginary village, Pretville. We played with our fingertips on the rim of the drum, as we imagined that we tip-toed down the corridor of the school, down the steps and out of the door. I continued to facilitate the journey, and used soft and louder drumming to depict the path we followed over hills, over rivers, and eventually down a hill so reach the village.

I asked the group members to place their djembes behind their chairs for the next activity. I handed out a variety of shakers and egg-shakers to each member of the group. I asked them to place the shakers in their left hand, with that palm facing up. I then directed them to take their right hand, lift the shaker, and place it in the left hand of the child sitting to their right. We started with the exercise and practised the movements. The children found the synchronization of the exercise quite difficult, and we had to practise it a few times. After approximately 10 attempts the group managed to grasp the idea, and started to move together, and achieved one sound from the shakers. The group continued with this exercise for at least 10 minutes, and seemed to enjoy it as they grasped it. We started the exercise a third time, and although the children were very quiet, and one sound was heard from the shakers, two children dropped their shakers. We started the exercise for the fourth time, there was complete silence, and one sound was heard from the shakers. The focused concentration lasted for approximately 30 seconds, and then a child dropped a shaker again.

The next exercise aimed to explore the relationship between sound and movement. I stood in the middle of the group and explained that I was going to jump up and down, and they were to play on their drums together, only when my feet touched the floor. I started jumping, and the group played together as my feet touched the floor. They were very quiet, and seemed to enjoy the activity. We continued with this exercise for approximately five minutes. I explained to them that the second part of this exercise was that I was going to give steps in the middle of the circle, and they had to play on their drums only when my feet hit the floor. We continued with this exercise for approximately 5 minutes as well. They enjoyed this activity as well, they were very quiet during the activity and laughed

afterwards. I invited any member of the group to lead this activity, and one volunteered. They followed their fellow member well, and was quiet during the activity, and afterwards clapped hands for him. I invited another member to lead the group, but nobody volunteered.

For the next exercise I asked them to place their drums behind them. I explained to them that the exercise was called a cosmic orchestra. I handed out a word written on a piece of paper to each one of them, and spoke about rhythm being everywhere, in particular in nature surrounding us for example, the seasons, day and night and sun and moon. I described to them that I wanted them to say the word that they were given, and articulate it as rhythmical as possible. I asked all the children to say their words once. The words were, “so-mer, winter, seisoene, dag, nag, tyd, aarde, herfs, roteer, spin, maan, wind, asem, boom” they said the word without distinct rhythms, and I asked them to repeat the words again, but to say each word twice, and try and add a more articulated rhythm. The children repeated the words, “somer, somer, winter, winter, seisoene, seisoene, dag, dag, nag, nag, tyd, tyd, aarde, aarde, herfs, herfs, roteer, roteer, spin, spin, maan, maan, wind, wind, asem, asem, boom, boom”. The rhythmic nuances of the words were slightly better, and they also pronounced the words more articulated, and emphasized certain syllables. The last part of the exercise required the children to play their words on their drums. I explained to them that the first member of the group started with his/her word, and continued with this word, as the others joined in one by one, and also continued saying their words. The first member of the group started to play his word, and the others all joined in one by one thus creating polyrhythms. This exercise continued for approximately 3 minutes, and the children looked focused, as if they enjoyed the activity.

The last exercise was the breathing exercise which was done previously, but would now be performed together as a group, and they would have to follow my breathing. At first they had to breathe only when I breathed out. They played well together. The second part of the exercise required them to play when I breathed in. they did not play together well, and seemed to lose focus.

We concluded the session by returning from our imaginary village, down the mountain, playing with fingertips on the rim of the drum, then jumped over the river, I guided them into sweeping movements, then tip-toed through a mountain path – fingertips on the rim of the drum, and then ran down the road, light slap movements moving into a crescendo and I guided them up the road to the school, up the stairs, down the corridor, into their class, and onto a chair. The slapping movements moved into light finger tapping on the rim which moved into a crescendo and one slap to indicate them sitting down on a chair.

The group ended with the affirmation, life is neat when you stay in the beat. They could free rumble together while saying the affirmation together. They continued with the free rumbling session for approximately 10 minutes, and experimented with different rhythms.

## DATA ANALYSIS

### Session 6

We started the session again as I told them that we would escape to our imaginary village, Pretville. We played with our fingertips on the rim of the drum, as we imagined that we tip-toed down the corridor of the school, down the steps and out of the door. I continued to facilitate the journey, and used soft and louder drumming to depict the path we followed over hills, over rivers, and eventually down a hill so reach the village.

We discussed the topic of rhythm and music that are contained in our bodies. I handed out words which portrayed rhythm, to one half of the group. The group members which received the words had to say the words rhythmically to their partner on the opposite side of the circle, and that person had to repeat the rhythm on the drums. The words as said by the first half of the group was, “wak-ker”, and it was repeated by the drummer as taa-aa-taa, “sla-ap”, and the drummer played, taa-aa-taa, “da-nsssss”, played by the drummer as taa-aa-aa-aa-taa, “long”, played as taa-ta-te-taa, “polsslag” played by the drummer as ta-te-taa, “hart” played as ta-te-taa, and “hartklop” played as taa-taa.

I asked them to repeat the words again, but add a body movement to the words. The body movement did not have to fit with the word, and I gave the example of the word “wakker” with which a body movement such as a twirl of the hands could be used. The first half of the group had to say the words and add a body movement, and the second half had to play the rhythm again. When the person had said the word they had to keep saying the word and continue with the body movement as well, while the next group members said their words with body movement, accompanied by their corresponding drum partner. When the first group member had to start, he kept quiet, as it seemed that he was unsure of what to do. I explained again that they had to say the word rhythmically, and simultaneously add a body movement to the rhythm of the word. I gave an example again, and said the word “wakker”, and added a stretching movement. The group member indicated that he understood, and said the word, “wakker”, and repeated the movement I had suggested – drum rhythm was ta-te-taa. The next word was “slaap” – he folded his hands under his head, and the drum rhythm was taa-ta-te-taa, the next word was “dans”, which was accompanied by a lively

swirl of his arms in a circle, the drum rhythm was taa-taa-taa. The next word, “long” was accompanied by a patting of his hand on the side of his upper torso, and the drum rhythm was, taa-aa-taa. The word “polsslag” was indicated as two finger clicks, and the drum rhythm was taa-ta-te-taa. The word “hart” was indicated by patting her heart, and the drum rhythm was, taa-aa-taa, and “hartklop” was indicated by finger shooting movements, and the drum rhythm was, taa-taa-taa. The movement exercise continued for at least 3 minutes, and the children laughed, tapped their feet, moved their feet rhythmically and clearly enjoyed the exercise.

For the next exercise the group swapped around, and the group who had said the words with body movements previously had to play drums, and the previous drummers were given new words to say rhythmically. I handed out new papers with words written on them. The first group member in group two said, “loop” (taa)-I encouraged him to add some rhythm to the word, and he then replied, “lo – op” and the drummer reflected taa-aa-taa, the next word was “oog-knip”, the drummer reflected taa-taa. the group member who had said the rhythmic word listened attentively to the drummer while the rhythm was reflected by turning his ear towards the drum, and afterwards nodding and smiling when he heard the rhythm repeated accurately. The next word was “spring”, and the drummer played, taa-taa. the next word was “rit-me”, the drummer reflected, taa-taa, then “asem”, the drum rhythm was ta-te-taa, the next word was “hardloop”, and reflected on the drum as ta-te-taa, the last word was “sing”, and the rhythm echoed was ta-te-taa. It was clear in this exercise that the group members who had said the words seemed very pleased when the drummer reflected their rhythmical interpretation of the words accurately. The body movements of the group members indicated that it was important to them that the drummer echoed the rhythm accurately, as they listened to the word being said, and then turned their heads and looked at the drummer, listened attentively, by turning their heads to one side, and smiling or laughing when the rhythm reflected was accurate.

I then asked the group members who had said the words rhythmically to add a body movement and continue saying the word and the body movement together as a group. The first group member started with “loop”, and the drum reflection was, ta-fe-te-fe-ta-fe-te-fe. The group member who said the rhythmic word stopped after saying the word for the first time, I had to encourage him to say it again, and reminded him twice to keep on repeating

the word. The second member said, “oogknip”, and the drum response was, taa-taa, this was repeated four times before the next member said, “spring”, and the drum reflection was, taa-aa. This word was also repeated four times before the next word, “ritme” was introduced, and the drum response to this word was, taa-e-fe-taa-e-fe. The next word was “asem”, and the drum rhythm was, ta-te-taa, and the following word was, “hardloop”, and the drum rhythm, ta-te-ta-te-taa. The next word was, “sing”, and the drum rhythm was, taa-aa-aa-aa. The group members looked at each other and smiled and laughed out loud, some tapped their feet, they moved their upper bodies from side to side with the rhythm and some moved their heads from side to side. We continued with this exercise for at least five minutes.

We concluded the session by returning from our imaginary village, down the mountain, playing with fingertips on the rim of the drum, then jumped over the river, I guided them into sweeping movements, then tip-toed through a mountain path – fingertips on the rim of the drum, and then ran down the road, light slap movements moving into a crescendo and I guided them up the road to the school, up the stairs, down the corridor, into their class, and onto a chair. The slapping movements moved into light finger tapping on the rim which moved into a crescendo and one slap to indicate them sitting down on a chair.

The group ended the session with the affirmation, “ons harte is jonk en sterk”, and they played it to the following rhythm, ta-taa-taa-te-taa-taa-taa. We repeated this exercise for approximately 2 minutes, it seemed as if the children were tired, they played the rhythm without much emotion or body movement.

## **DATA ANALYSIS**

### **Session 7**

We started the session again as I told them that we would escape to our imaginary village, Pretville. We played with our fingertips on the rim of the drum, as we imagined that we tip-toed down the corridor of the school, down the steps and out of the door. I continued to facilitate the journey, and used soft and louder drumming to depict the path we followed over hills, over rivers, and eventually down a hill so reach the village.

I explained to the members of the circle that I was going to play with a ball in the middle of the circle. I told them that I was going to use the ball in three ways, I was going to bounce the ball, throw the ball up in the air and catch it, and roll the ball. I told them that when I bounced the ball I wanted them to play once only when the ball touched the ground. I then revised the three different drum slaps that we had learnt in the second drum session. They were eager to demonstrate and show me, they said “dit is die muffle slap”, and demonstrated it, “die open slap”, and demonstrated it, “die bass slap”, and demonstrated it. I asked them to practise the three slaps together as a group, in the order, open, bass, muffle. They practised this a few times and seemed to enjoy it, they looked attentively at their drums, they smiled and played well together as a group.

I introduced the ball again, and told them that had to play only when the ball bounced. The group had to use the open slap for the bouncing action of the ball. I dropped the ball, and the group played one beat together. I slowly continued to bounced the ball, and they continued to play together. I increased the speed, and the group continued to play together well. I then explained that I was going to throw the ball into the air and when I caught it in my hands, they had to play once on their drums. The group had to use bass slap when I caught the ball. I threw the ball a few times, and they played together as a group, as I caught the ball. I then demonstrated that when I rolled the ball I wanted them to stroke over their drumheads. When I rolled the ball the sweeping motions over their drumheads were not well coordinated. I then explained that I was going to combine the three movements and they had to watch very carefully in order to play accurately with my movements. I bounced the ball a few times and the group played together. I then threw the ball into the air and

caught it twice, and the group played together. I stopped and said that I wanted to hear a difference in sound between the bounce and the catch, and reminded them again that bounce was open slap, and catch was bass slap. The group did not play accurately when I caught the ball. Next I rolled the ball and the group was not coordinated together, but I started counting, “een, twee, een, twee”. They started to play together more coordinated, and “swept” over their drumheads with their hands. I then invited one of the group members to join me, so that we could throw, roll and bounce the ball to each other. One of the boys volunteered, and went to sit on a chair opposite me. I moved my chair so that I was facing him directly, and I swiftly reminded the group about the three different slaps for the three different ball movements. As we started with the different movements the group took part actively and looked intently at the movements we made. Their responses were fairly accurate. The activity carried on for at least 10 minutes. It was clear that the group member who had joined me in the middle of the drum circle was enjoying the responses to his movements, as he smiled broadly each time the group responded accurately to one of his movements. Afterwards the group clapped hands spontaneously.

I explained to the group that we were now going to create a thunderstorm together. First we discussed the various elements of a thunderstorm. I asked them where rain comes from, they replied “van die wolke”, and I replied that it was indeed from the clouds, and if we looked out of the window now we could see the clouds, but how did the clouds get there? One of the group members answered, “die water kom in die wolke want daar is waterdamp wat opstyg” I explained further that, if it rained in the Strand in the morning, and there were no clouds in Stellenbosch, how did the clouds full of rain get to Stellenbosch? Somebody answered, “daar’s stoom”, and somebody answered “die wind”. I explained to them that we were first going to create the sound of the wind, by making “sweeping” motions over the head of the drum, they joined in and copied this sound with me, we then made the sound of light rain, by using our fingertips lightly on the rim of the drum, and then continued to copy the sound of the raindrops by playing with the palms of our hands louder in the middle of the drum. As the sound grew louder they laughed loudly and looked at each other. We stopped, and I asked them what other sound was also part of a thunderstorm and they answered, “donderweer”. I explained to them that we were going to imitate the sound of the rain, and then play a thunderbolt, and then continue with the sound of the rain again

after that. We started with the sound of the wind, and then the light patter of the rain with fingertips on the rim of the drum, then the louder raindrops, and as the rain grew louder, we played one loud thunderbolt together by all slapping the drum once in the middle. We continued with this exercise for at least 10 minutes. This exercise was very freely structured, and allowed room for experimentation and free play. The group laughed and moved around with their bodies. Some introduced their own thunderbolts in between the rain.

I explained to them that the next exercise was going to be more structured. I then introduced them to body sounds, they had to first clap their fingers together, then pat their laps with open hands, and then start with the soft pattering of the rain. As the rain grew louder and I started counting “3, 2, 1” and then the group played the thunderbolt together. This was very successful, as the sound was very loud, and all the group members played together. We continued with a few thunderbolts on our drums, and then continued with the sound of the rain growing softer and softer, ending with patting on the laps and lastly fingersnapping. The group members looked tired as two of them leant forward on their drums, and others leant on their arms and knees.

I allowed the group to end with a free rumble session, while they chanted the affirmation, “we all stand together”. The group experimented with various rhythms, and moved around with their upper bodies while playing. They also moved their heads from left to right whilst playing.

## **DATA ANALYSIS**

### **Session 8**

The group started the session as the previous sessions, with an escape to their imaginary village. The group played with their fingertips on the rim of the drum, as they imagined they tip-toed out of the classroom, down the corridor of the school, down the steps to the ground floor, and out of the door. I facilitated the journey further towards the village, and the group used louder and softer drumming to picture their movements to the village.

I assisted the group to move the djembe drums out of the way, and handed out large wooden scraper frogs to the group. I demonstrated to the group how to play these instruments and gave the group the opportunity to try the instruments out themselves. The participants seemed fascinated by the sounds and the instruments and inspected the wooden frogs closely. I initiated a discussion with them about where frogs live, and where they are found. Next we switched off the light in the room, and I suggested to the group that they could close their eyes, as we were going to recreate a frogpond, and pretend that we are frogs living in the pond. The participants looked at each other uncertainly and some giggled.

I asked the participants to listen carefully to each other during this activity. I would point to one participant to start “ribbeting”, and thereafter, one participant at a time could fall in. I suggested to them that they should listen carefully to a dialogue that could start between the participants. I also encouraged the group to listen to the texture and tempo that developed, and each one should attempt to enhance and enrich that texture. The participants seemed to enjoy this relaxing, experimental activity, and continued to play on the wooden frogs for at least five minutes. The sound was initially soft, but grew in volume, and eventually died down again. The group seemed peaceful and quiet and enjoyed the calmness and meditative quality of this activity.

For the next activity, I asked the participants to move into the djembe drum circle again and place their drums in front of them. This activity involved an African song, with drum playing. The song we chose to sing was Shosholoza. I chanted the words of the first line to the group, and the group echoed the line of words. When I had chanted the entire song, I added drum

accompaniment as I chanted the first line again. The group echoed the first line after me again. It appeared that they enjoyed this singing activity as well as they smiled and participated well. After they had practised the entire song I divided the group into two sections and the one section kept a steady beat while the second group played the rhythm of the song, and sang the song. Afterwards the two groups exchanged roles.

The next activity involved an African story. I told the story, “Why the sun and moon live in the sky”. I explained to the group that I wanted them to provide sound effects for the story. As I started the story I provided clear opportunities for the participants to add sounds, such as footsteps, the sound of the moon gliding in behind a cloud, the sound of sun shining. The group participated eagerly and I made sure that each participant had an opportunity to provide a sound effect.

The next activity takes the form of guided improvisation. I explained to the group that we were going to play a lullaby on the djembe drums, and they were all going to participate in the song. I discussed the essence of a lullaby with them. I emphasized that it was a gentle song with a swaying rhythm. I asked one of the group members to play on her drum what she thought a lullaby on a drum sounded like. The participants seemed a bit reluctant at first, but I indicate to her to just continue in the same way, and she played more confidently. I indicated to another group member to join her. The rhythms gradually joined in and a calm, gentle beat developed. The participants smiled at each other and swayed their bodies with the beat. The music gradually came to a natural end.

We ended our session off by returning from our imaginary village, and imagined that we were tip-toeing alongside the river, over the mountain, jumped over the river at the mountain’s foot. We played with fingertips on the rim of the drum, and moved into light slap movements that escalated into a crescendo, and I guided them into their class, and onto their chairs. The drum slapping moved into light finger tapping on the rim of the drum, and one loud slap to indicate that they were sitting on a chair.

# Appendix K

## DATA ANALYSIS OF OBSERVATIONS AND PARTICIPANTS' DIARIES

### DATA ANALYSIS

#### Session 4

We started the session again as I told them that we would escape to our imaginary village, Pretville. We played with our fingertips on the rim of the drum, as we imagined that we tip-toed down the corridor of the school, down the steps and out of the door. I continued to facilitate the journey, and used soft and louder drumming to depict the path we followed over hills, over rivers, and eventually down a hill so reach the village.

I discussed the fact that rhythms existed within words and phrases naturally. I asked them to recall how they found different rhythms for their names. I told them that in the next exercise we were going to use affirmations such as, "ek is super" or "ek is goed genoeg" I started and gave an affirmation, and asked them to reflect it on the drums afterwards. I started with, "ek vergewe myself en laat my verdede gaan". As this is a long sentence the group found it very difficult to reflect this rhythm together as a group, I played along with the group and attempted to sustain a constant rhythm, but was not successful. I stopped them, said the sentence again, and played it with them, but slower and accentuated. The next sentence was, "ek omarm die nuwe". The rhythm as a group was not constant, but as they played together, gradually gained some uniformity. I then said, "ek is goed genoeg". **They played this sentence together remarkably well, and I continued with this rhythm for at least 60 seconds. I let them continue with the rhythm and said the next sentence while they kept the constant rhythm.** I placed the words so that they fit into the existing rhythm, and changed the rhythm slightly if needed. The next sentence was, "ek is kragtig, slim en wys". We continued with the constant rhythm, and I introduced the following sentences, "ek voel vrede, ek verdien liefde, ek is 'n groot sukses, ek vergewe myself, ek is 'n drommer". The group chanted together very well, and a feeling of calmness and serenity was felt. We kept on with this constant rhythm for at least 5 minutes.

Connected to other members of the group

Serenity

I explained to the group that in the next exercise they could each have a turn to say something to the group, using their drums, not language. Their musical statement could be soft pattering or loud hammering. What the person said to the group would then be echoed by the group as accurately as possible. I asked the child sitting on my right to start with the first statement, and he replied verbally, "ek is nuut". I explained to him that I wanted him to play his statement on his drum. He laughed and looked away embarrassed, and I said, "ek wil graag hê jou drom moet vir ons jou woorde gee". He played the rhythm, taa-taa-taa on his drum, and the group echoed it. I stopped the group with a hand movement, and pointed to the next child, he looked at me for a few seconds, and then played a very interesting rhythm on his drum, ta-e-fe-ta-e-fe-ta-e-fe, and the group accurately reflected his rhythm. The next child played, ta-e-fe-taa-taa, and the group accurately reflected this rhythm. The following child played ta-te-ta-te-ta-te-taa, and the group also reflected this rhythm accurately. It was clear that there was a sense of focus and concentration in the group that was not present previously. The next child's rhythm were ta-te-ta-te-ta-te-taa. The following rhythm was ta-te-ta-te. The group did not reflect this rhythm very accurately as the child who introduced it played soft. Eventually the rhythm was 'heard' by all the group members, and echoed rhythmically. The next rhythm was complicated, and when repeated it was different to the first, and when she repeated it the third time it also differed from the first and the second rhythms. I started playing and deduced a rhythm from the three rhythms she had played, and the group followed. I tried to communicate with movements during this exercise, and did not make use of any verbal instructions. When it was a person's turn, I pointed, and when they had to stop I showed them with a hand signal. The next rhythm that was played was taa-ta-te-taa-taa, and was immediately reflected by the group accurately. It seemed that the children were getting tired, as they started to shift around while they were playing. The next rhythm was ta-te-ta-te-taa, and the group also reflected this rhythm accurately. The next rhythm was taa-taa-taa, and

Self-esteem

Connects to other members of the group

Concentration

Connects to other members of the group

the group reflected this rhythm accurately as well. The next child played a simple rhythm, ta-te-ta-te-taa, but introduced a drumming technique where both hands moved gradually to the middle of the drum, whilst playing. The group had some difficulty in repeating this rhythm, but succeeded after the third attempt. The following child's rhythm was, ta-e-fe-ta-e-fe-ta-te-ta, and the group immediately reflected the complicated rhythm accurately. The following rhythm was ta-te-ta-te-ta-te-ta-te, and the group also reflected this rhythm accurately. The following child introduced the rhythm, taa-taa-taa-taa. As this was a relatively simple rhythm the 'groove' was lost as they played this simple rhythm. As we played it I introduced an increase in tempo.

Creative  
free  
expression

In the next exercise the group members had to form pairs and turn and face each other. I asked one of the members to sit and face me, and I demonstrated to the group that one member of the pair had to breathe in and out slowly, and the other member had to play on the drum only when the other person breathed out. The group followed the instructions and the one half started playing when the others breathed out. Gradually the group synchronized, and one drum slap was heard. The pairs then switched over, and the other member had to breathe while the drumbeat accompanied the breathing out. It seemed as if the children were becoming tired as they moved around again and looked drowsy. Lastly they had to breathe together as a pair, and play together on the drums, as they breathed out together.

Connected  
to other  
members of  
the group

We ended with an affirmation that we said together as a group: "You belong, I belong". The group free rumbled while saying the affirmation, and the rhythm and synchronization was good. This continued for at least 5 minutes.

Connected  
to other  
members of  
the group

We concluded the session by returning from our imaginary village, down the mountain, playing with fingertips on the rim of the drum, then jumped over the river. I guided them into sweeping movements, then tip-toed through a mountain path – fingertips on the rim of the drum, and then ran down the

Positivity/Enjoyment

Die mesiel het ~~to my~~  
betes en lekker laat  
voel ek het dit  
 baie ~~geniet~~ en  
ek. is vir meer

Positivity/Enjoyment

30 September 2014

Ek het lekker gevoel, maar  
my hande was styf en  
het seer gekry toe ek  
op die wamme gestaan het.

Positivity/Enjoyment

1 Okt. 2014.

Die begin was nie interessant  
nie maar verder in die setre  
was dit nogal lekker interessant.  
Die musik gee lekker ritme.

2 okt 2014

Die beat laat jou lyf lekker  
ritme in kry. Dit was  
fantasties.

Connectedness  
to self

3 Okt. 2014

04/10/2014

Ek voel baie lekker  
want die musiek het my  
lekker laat voel maar my  
bene is moeg gesit en  
my arms is ram

Positivity /  
Enjoyment

30/09/2014

1 Die eerste drom sesie was vir  
My baie opwindend en ek het  
baie van MiSiek se geleer wat  
ek nie van ge weet het nie

2.

01/10/2014

Die drom speelik het My baie  
ge help met konsentrasie en  
om te fokus op self vir troue.

Concentration

3b

02/10/2014

Die drom het ge help om die  
MiSiek van binne My uit te bring.

Concentration

4o

03/10/2014

Die bonder storm en reën val  
was in baie opwindende gespeelike

## Appendix L

### FOCUS GROUP INTERVIEW 2

(Key; P= Participant + number)

**Navorser:** Onthou julle die navorsingstaak wat ek verlede jaar gedoen het? Julle het dromme gespeel, maar dit het eintlik gegaan oor 'n navorsingsprojek wat ek gedoen het. Onthou julle, jy het musiek gemaak, ons het saam dromme gespeel...maar ek wou eintlik kyk of dit 'n effek, of 'n invloed kon hê op jou leer in die skool, of jou skoolwerk. Daar is baie mense wat al studies hieroor gedoen het, hulle het ander instrumente gebruik, dromme of klavier of kitaar. Daar is iets wat gebeur in 'n mens se brein, en met jou as 'n mens, wat dit vir jou bietjie makliker maak om te leer in die skool.

**Groep:** (Skud hulle koppe bevestigend, lag onderlangs).

**Navorser:** Reg, ek wil graag by julle hoor...het julle in die maande wat nou verby is gedink oor hierdie dromme wat julle gespeel het?

**Groep:** Ja (5 deelnemers antwoord)

**P4:** Ek het gedink hoe dit my beter laat voel het as ek...as ons daar gespeel het.

**Navorser:** het dit jou regtig laat beter voel? Ek vra dit want ek het julle boekies weer gelees, onthou julle die dagboekies waarin julle geskryf het? En omtrent elkeen van julle het gesê dit laat julle beter voel, toe wonder ek, is dit net iets wat julle skryf, omdat almal om jou dit skryf, of is dit werklik iets wat jou laat beter voel?

**P11:** Is regtig so.

**Navorser:** Vertel vir hoe laat dit jou beter voel...voorbeelde kan wees, jy voel 'n bietjie rustiger of jy voel goed oor jouself?

**P4:** Kalm.

**P5:** Rustig.

**Navorser:** Rustig...ja...nog iets? (ongeveer 2 minute se stilte verloop)

**Navorser:** Is daar van julle ander wat gedink het oor die dromgroepie? Daar het nou al 'n redelike tyd verloop vandat ons saam in die groepie gespeel het. Ons het net voor die Septembervakansie verlede jaar klaargemaak met die groepie. Is daar van julle wat in die vakansie aan die dromgroepie, of die musiek gedink het?

**P1:** Ja ek het gedink daaraan.

**Navorser:** Ja...wat het jy gedink?

**Groep:** (Stilte)

**Navorser:** Is daar van julle ander wat 'n opinie het daaroor?

**P2:** Ek het nie daaroor gedink nie.

**Navorser:** Dis reg, jy moet heeltemal eerlik wees, as jy nie weer daaraan gedink het, of dit het vir jou niks beteken, of jy het nie daarvan gehou nie, kan jy dit nou sê.

**Navorser:** Kom ons wys met ons hande wie het in die vakansie gedink aan die dromgroepie?

**Groep:** (7 deelnemers steek hulle hande op)

**Navorser:** En wys nou vir my wie het nie gedink daaraan nie?

**Groep:** (3 deelnemers steek hulle hande op)

**Navorser:** Sê vir my, dink julle die dromgroepie het julle skoolwerk enigsins beïnvloed, of iets aan jou skoolwerk verander...dit beter of swakker gemaak?

**P7:** Nee

**P10:** Ja dit het.

**Navorser:** Het dit? Op 'n goeie manier?

**P10:** Ja.

**Navorser:** Goed, so dit het jou skoolwerk op 'n goeie manier beïnvloed.

**Navorser:** Kan jy miskien vir my 'n voorbeeld gee?

**P10:** Uhhmm, as mens die drums kap...dan voel jy mos die ritme...

**Navorser:** Ja

**P10:** en as ek leer, dan dink ek daaraan, die ritme, dan onthou ek beter, dan sê ek die werk op die ritme, dan onthou ek beter

**Navorser:** Ja, so jy het die gevoel van die ritme gebruik, en vir jousef iets uitgewerk, wat vir jou in jou leermetodes goed werk, en wat jou help.

**P10:** Ja.

**Navorser:** Dit is iets wat baie van julle dalk self in julle leerwerk doen, of miskien iets wat jy later kan doen as jy leer, wat die leerwerk vir jousef makliker maak. Jy die feite op 'n ritme vir jousef te sê, of 'n liedjie daarvan te maak, of 'n prentjie vir elke feit teken, of 'n storie te maak van al die feite bymekaar. So 'n voorbeeld daarvan kan wees, Hitler het in Duitsland oorlog verklaar, dan kan jy dit vir jousef op 'n ritmepatroon sê, Hit-ler het in Duits-land oorlog ver-klaar. Ja – so jy leer 'n feit op 'n beat.

**Navorser:** Enige iemand anders wat ook so iets uitgewerk het, of iets anders miskien, wat julle gevind het die dromgroepie laat jou aan dink?

**Groep:** (Stilte).

**Navorser:** Die dromme kan mens ook laat voel, sjoe, ek kan hierdie dromme nogal goed speel, so ek is nie te bad nie...jy kan goed oor jousef begin voel. So waar jy miskien voorheen kon voel...ek is nie goed in dinge nie...kan die dromspeel jou help om beter oor jousef te voel...so dit verhoog jou selfbeeld, en as jou selfbeeld hoog is, dan is dit moontlik om beter te punte te kry in jou skoolwerk... Is daar iemand wat dit miskien gevoel het?

Het iemand miskien na die dromgroepie gedink, sjoe, ek is eintlik oraait? Iemand dit gevoel?

**Groep:** (Stilte).

**Navorser:** Is daar iemand wat enige iets verder oor die groepie wil sê?

**P10:** Wanneer gat ons weer begin?

**Groep:** (Lag almal)

**Navorser:** Is daar nog wat voel soos Kaylin? Steek julle hande op.

**Groep:** Ekke, ekke (7 deelnemers steek hulle hande op)

**Navorser:** Ja, daar is mense wat hou daarvan om te speel, en daar is mense wat nie daarvan hou nie, en dit is heeltemal reg so, want verskillende mense hou van verskillende dinge.

**Navorser:** Ek is tog bly om dit te hoor, want as daar van julle is wat wil aangaan, beteken dit dat dit vir julle 'n goeie ervaring was.

**Navorser:** Ek gaan my bes doen, ek sal graag wil hê dat daar 'n dromgroepie aangaan by hierdie skool.

**Navorser:** Is daar iemand wat nog 'n bydrae wil gee, wat iets wil byvoeg?

**P5:** Dit het my baie gelukkig laat voel.

**Navorser:** Goed, baie dankie, dit is goed as die musiek jou gelukkig laat voel het.

Is daar iemand anders wat 'n bydrae wil gee?

**Groep:** (Stilte)

**Navorser:** Goed dan, baie dankie aan elkeen van julle vir julle deelname en samewerking.

Ek hoop om jou julle gou weer te sien.

## Appendix M

### DATA ANALYSIS OF PARTICIPANTS' DIARIES

#### DATA ANALYSIS PARTICIPANTS' DIARIES

SESSION ONE AND TWO: Participant's diaries (22, 23 Sept)

SESSION THREE AND FOUR: Participant's diaries (30, 1 October)

SESSION FIVE AND SIX: Participant's diaries (2, 3 October)

SESSION SEVEN AND EIGHT: Participant's diaries (6, 7 October)

CATEGORY	CODES	PARTICIPANTS													
		1	2	3	4	5	6	7	8	9	10	11	12	13	14
	Excited anticipation (" ek het uitgesien om skool toe te kom (4); ek het vanoggend opgewonde geraak toe ek dink aan vanmiddag se sessie(3); ek kon nie wag om weer hier te wees nie(2); ek kan nie wag vir die volgende sessie nie"(2))	x	x	x	x	x	x	x	x		x		x	x	x
	Enjoyment/Pleasure ("die sessie was amazing (2); "ek het die klank vn my mesiek geniet"(12); "dsie sessie was baie lekker, interessant en ek het dit geniet" (13); "ek het dit baie geniet" (14); "ek het dit baie geniet" (10); "sjoe baie lekker en opwindend, geniet dit baie" (8); "ons voel gelukkig" (5)	x	x	x	x			x	x	x	x		x	x	x

CATEGORY	CODES	PARTICIPANTS														
		1	2	3	4	5	6	7	8	9	10	11	12	13	14	
	Trust	x														
	Interesting experience (“dit was baie interessant, en ek het baie geleer” (14); die musiek is intresand” (9)	x	x	x	x	x				x	x				x	
	Positive emotion (“ek voel beter (13); ek voel lekker; dit het my goed laat voel(13); lekker laat voel (12); lekker laat voel(10); “ek het fantasties gevoel (6); ek het baie goed gevoel” (4); “dit het my lekker laat voel”(12); “dit het my meer gelukkig laat voel” (13); “dit laat my ook lewendig voel” (2); “het nie woorde vir die sessie nie, al wat ek kan sê is fantastic”(2); “lekker om te slaan op die dromme, geniet dit baie” (8); “ek het dit baie geniet” (12); “ dit het my spesiaal laat voel” (13)	x	x x x	x	x	x	x	x	x	x	x		x x	x x	x	
	Wants to learn more about music (“ek het baie van musiek geleer” (11)); “ek het weereens baie geleer oor drums” (14)				x							x			x	
	Physical sensation (“my hande was seer gekap”(12); “my hande was seer” (4); “my hande was seer en rooi” (3); “my vingers is styf en moeg” (2); “laat my arms lam raak” (8)		x	x	x				x		x		x x			
	Connectedness (“musiek het mooi saamgekom” (4); “musiek van binne my uit te bring”(11); “die beat laat jou lyf lekker ritme kry” (3); “ek voel baie lekker want die musiek het my lekker laat voel” (3); “die mesiek het my beter en lekker laat voel” (12)			x	x							x	x			
	Teamwork (“almal het saam gespeel” (4); “jy moet ‘n ander persoon vertrou’ (6), “ons almal saam tromme gespeel het”(10); “was ‘n plesier om saam almal te werk” (10); “ons het almal saam gespeel” (1); “ons het nou almal saam gespeel en dit was lekker” (1); “ek kan voel dat ons as ‘n groep saam begin werk” (5); “ons het lekker saam gewerk” (9)	x x	x		x	x	x			x	x					x

CATEGORY	CODES	PARTICIPANTS													
		1	2	3	4	5	6	7	8	9	10	11	12	13	14
	Energy (for learning?)(“so jy meer musiek maak kry jy meer brein energie” (9); “op ons laaste speletjie het ons baie goed afgesluit” (14)									x					
	Rhythm (“die musiek gee lekker ritme” (3); “ek het die ritmiese gevoel gekry”(10); “ek was in ritme”(12); “ek het baie lekker gekry op die beat” (13); “ die ritmiese ervaring was fantasties en was baie opwindend” (10); “leer hoe ritme gaan” (8); “die musiek het geklop”(6); “die beat laat jou lyf lekker ritme kry” (3); “die I belong we belong was ‘n fantastiese ritme” (10)			x			x		x	x			x	x	
	Relaxation (“lekker ontspanning”(13); lekker laat slaap (10); lekker geslaap; lekker geslaap” (7))						x	x			x			x	x
	Pleasurable entertainment (“ dit was fun” (11))											x			x
	Expectation of positive emotion (“lus vir meer musiek (12); ek het uitgesien daarna” (11); “ek lus om verder te speel” (13)											x	x	x	x
	Meta-cognitive awareness (“ek het aan die navorsingstaak gedink, en hoe dit my laat voel (7); dit was baie interessant wat ons nou geleer het” (1); “daar was iets wat in my geborrel het, ek het daarvan gehou”(6); “so jy meer musiek maak kry jy meer brin energie” (9); “die drom speelkie het my baie gehelp met konsentrasie en om te fokus op selfvertroue” (11); “om iets te vertel in ‘n stoorie is iets wat ek nooit an gedingk het nie, ek al dit graag meer wil doen, want ek virstaan dit beter so” (11)	x					x		x	x		x			
	Transfer of positive emotion to personal situation (“ek was opgewonde om my ouers daarvan te vertel”(7); “voel weer lekker na wat ek gedoen het nadat ek vanoggend sleg gevoel het”(8))							x	x						
	Pride and emotion (“ek gaan vir almal vertel van my ervaring”(6)				x		x			x					

CATEGORY	CODES	PARTICIPANTS													
		1	2	3	4	5	6	7	8	9	10	11	12	13	14
	Continued effect of experience (“ ek het nog steeds die ritme gevoel en gehoor in my kop”(4); “ek is trots op myself” (9)														
	Different motivation (“as mevrou nie hier gewees het dan sal ek maar net hier by die skool gesit het en niks gedoen het nie” (1)	x													
	Free expression (“omdat ek my gevoelens kan express” (2); “ek voel gelukkig en vry” (5)	x				x									
	Connectedness with nature/ (“die natuur van die musiek het deur my gedagte gevloei” (5)					x									
	Mystic insight (connection with indigenous past) (“dit was soos as almal om ‘n vuur sit en een van die Zulu hoofstamme ‘n storie vertel” (5)“asof ons inspirasie van God gekry het” (5))						x								
	Concentration and focus (“jy moet focus, ook konsentrasie” (6); “die drom speelkie het my baie gehelp met konsentrasie”(11)						x				x				
	Wishing, dreaming (“ek sal laaik om weer te kom na die sessie” (7))							x							
	Feeling unique/special													x	
	Appreciation (“dit was lekker om die drome te kapp baie dankie”) (7); “ek sê dankie dat jy gekom het” (14)							x						x	x
	Feelings of calmness, peace (“ek voel nou ristag” (12)											x			
	Motivation (“ek hou daarvan om uitdagings te kry” (6); “en ek voe inspireerind” (5)					x	x								
	Tired (“ek was moeg en het baie vaak gevoel” (4); “ek was moeg” (3)			x	x										
	Activity “ek het baie van die drom gespeel, en ek hou daar baie van, en ek sal laaik om weer te speel” (7)							x							

## Appendix N

### DATA ANALYSIS OF OBSERVATIONS

#### SESSIONS 1 - 8 DRUM CIRCLES OBSERVATIONS

CATEGORY	CODES	FREQUENCY: SESSIONS							
		1	2	3	4	5	6	7	8
	Nervous pre-tension, Uncertainty	4	8	5					
	Excited anticipation		1						
	Tentative, uncertain participation	1	7	1	1		1		
	Enjoyment (smiling, laughing)	1		1		4	7	4	
	Unrhythmic play (not together)	1	1	7	5	2		3	
	Positive participation (introducing spontaneous positive addition, experimenting with different rhythms)		4	2	1	2	1	16	
	Physical enjoyment (increasing volume, slapping louder, rhythmic body movement)	4	3			1	2	4	
	Accurate rhythmic reflection				7		21	4	
	Rhythmic participation	2	5	6	11	3	4	9	
	Spontaneous response	2	1	1					
	Active participation	1							
	Accurate participation	2							
	Spontaneous alternating rhythms	1							
	Comfortable narrative	1							
	Concentration and focus	1	1	1	1	5	3	1	

CATEGORY	CODES	FREQUENCY: SESSIONS							
		1	2	3	4	5	6	7	8
	Restless		1	5	1	1			
	Empathy			1					
	Mystic wonder/Calmness/Serenity in experience of rhythm			1	1				
	Teamwork ('in-tune' with each other)			1	1	1		9	
	Tired				2			1	
	Synchronization				3	7	1	9	
	Continuous practise of rhythms/technique					1		1	
	Praise					1		1	
	Increase in time							1	

## Appendix O

### RESEARCHER'S JOURNAL (Excerpt)

Researcher's reflective journal:

#### Session 1

The session did not progress as I would have hoped. The noise in the school was a constant, however, I got used to it after a while, and it seemed that the children were used to it. I had hoped that the drumming would become a place of calmness and serenity for them...

As the session started, the children took their places on the benches uncertainly, and moved around restlessly. Most of them crossed their arms in front of their bodies, and avoided eye contact with me. There was indeed a feeling of uncertainty – maybe uneasiness – with me? A power imbalance?

#### Session 2

The noise in the school was still something to get used to. The class started half an hour late – the teacher with the key could not be found. The session started with the children in an excited mood. They calmed down after the first activity. The group seemed more at ease with me. There were 2 girls that still seemed uncomfortable, and did not fully participate in the activities. They did not make eye contact with me, they also separated themselves from group activities by not participating fully.

#### Session 3

The session started without much difficulties (keys, finding all the group members, etc). The group seemed happy and excited, they seemed happy to see me as well. They seemed eager to play on the drums. Some of the boys started to free rumble on the drums by themselves. There were a lot of joking and laughing going on today. I was surprised by the successes in

some of the activities today. I was concerned about the lack of creative initiative in the first two sessions, but the children proved me wrong. They showed me that, if given the opportunity, and in a relaxed atmosphere of acceptance and trust, they had plenty of creativity to show.