ANGLIA RUSKIN UNIVERSITY

AN INVESTIGATION INTO THE RELEVANCE OF GAMELAN MUSIC TO THE PRACTICE OF MUSIC THERAPY

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ANGLIA RUSKIN UNIVERSITY ABSTRACT

FACULTY OF ARTS, LAW AND SOCIAL SCIENCES

DOCTOR OF PHILOSOPHY

AN INVESTIGATION INTO THE RELEVANCE OF GAMELAN MUSIC TO THE PRACTICE OF MUSIC THERAPY

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This study investigates the use of Indonesian gamelan with participants who have special needs or with special populations, and considers what the playing of gamelan music has to offer music therapy practice. The gamelan is an ensemble of instruments on which the traditional music of Indonesia is played, consisting of mainly tuned and un-tuned percussion instruments tuned to four, five or seven tone scales. Gamelan are being increasingly used for music activities with participants who have special needs, such as learning disabilities, mental health problems or sensory impairments, and with special populations, such as prisoners. Whilst aims are broadly educational, therapeutic benefits are also being noted.

There is little research into the effectiveness of this use of gamelan; the therapeutic benefits have not been researched within the context of music therapy. As an experienced music therapist and gamelan musician, I considered that investigating the potential for using gamelan within music therapy would produce new knowledge that could extend the practice of music therapy.

Various qualitative methods within a naturalistic paradigm were used to investigate current and past practice of gamelan playing with special needs groups and to identify the therapeutic benefits. Semi-structured interviews were undertaken with gamelan tutors working in this area and a music therapy project using gamelan with a group of children who had learning difficulties was undertaken by the author. Using a thematic approach to the analysis of data, the key features of gamelan playing which have relevance for music therapy practice were identified.

Gamelan playing was found to have a range of therapeutic benefits which can be used intentionally by a music therapist to address therapeutic aims. It was found firstly that the playing of traditional gamelan music can be used for specific therapeutic purposes and secondly, that the music and instruments can be adapted and used within various music therapy approaches and for participants with a range of disabilities. A set of guiding principles are also proposed for the use of this new music therapy practice.

Key words: music therapy, gamelan, group-work, special needs

Table of Contents

Acknowledgementsi
Abstractii
List of figuresviii
List of photosix
List of appendicesx
Copyright declarationxi
Chapter 1. Introduction1
1.1 What is a gamelan?1
1.2 Background to the study4
1.3 Personal context of the study
1.4 Research aims7
1.5 Music therapy overview9
1.5.1 Scope of practice12
1.5.2 General principles of music therapy practice13
1.5.3 Group music therapy14
1.5.4 Situating myself as a researcher and practitioner15
1.6 Outline of the chapters16
Chapter 2 Gamelan in Indonesia
2.1 A brief history of gamelan in Indonesia20
2.2 Gamelan music in context
2.2.1 Other music of Indonesia
2.2.2 Place in contemporary society
2.2.3 Reflections of the music in society
2.2.4 Cycles
2.3 The Instruments
2.3.1 Types of gamelan
2.3.2 Tuning
2.3.3 Sound qualities
2.3.4 Playing techniques
2.4 Overall structure of the music
2.4.1 Colotomic structure
2.4.2 Core melody
2.4.3 Elaborations of melody
2.4.4 Role of the drums
2.5 Conventions and concepts of playing

2.5.1 Etiquette	34
2.5.2 Group playing	34
2.5.3 Rasa	35
2.6 Summary	35
Chapter 3. Gamelan in the West	37
3.1 History	37
3.2 Gamelan and western composers	
3.3 Gamelan in the US	39
3.4 Gamelan in the UK	40
3.5 Gamelan in Education	41
3.6 Summary	42
Chapter 4. Gamelan with people who have special needs and with special population	lations 44
4.1 Physical Disabilities	44
4.2 Hearing Impairments	45
4.3 Learning disabilities	46
4.4 Research Studies	47
4.4.1 Learning disabilities	47
4.4.2 Autism	49
4.4.3 Attention Deficit Hyperactivity Disorder (ADHD)	49
4.4.4 Prisons and Young Offender Institutions	49
4.4.5 Physiological effects	51
4.5 Gamelan in music therapy	51
4.6 Gamelan and traditional healing practices	52
4.7 Other experimental uses of gamelan	53
4.8 Summary	54
Chapter 5. Methodological Overview	55
5.1 Positivism and Naturalism	55
5.1.1 Choice of approach	56
5.1.2 Qualitative Research	56
5.2 Context within music therapy research field	57
5.3 Setting the scene	58
5.3.1 Gamelan in Indonesia	58
5.3.2 Gamelan and special needs	58
5.4 Identifying the participants	59
5.5 Choice of research methods	59
5.5.1 Semi-structured interviews	60
5.5.2 Data analysis	61

5.6 Other qualitative methods considered	62
5.6.1 Grounded Theory	62
5.6.2 Interpretative Phenomenological Analysis	62
5.7 Further exploration of generated themes	63
5.7.1 School project	63
5.8 Outcomes	64
5.9 Reflexivity/ Stance of the researcher	64
5.10 Ethics procedures	65
5.11 Summary chapter five	65
Chapter 6. Mapping Exercise	67
6.1 Method	67
6.2 Mapping email	68
6.3 Mapping results	70
6.4 Discussion of results	72
6.5 Summary	73
Chapter 7. Semi-structured Interviews	74
7.1 Rationale	74
7.2 Selection of Interviewees	75
7.2.1 Review of respondents' answers:	76
7.3 Development of interview topics	78
7.3.1 Pilot Interview	79
7.3.2 Review of pilot interview	
7.3.3 Final Interview Schedule	
7.4 Interview procedure	
7.4.1 Researcher – Interviewee relationship	
7.5 Analysis of interviews	
7.5.1 Thematic Analysis	
7.5.2 Phase 1: Familiarising yourself with your data	
7.5.3 Phase 2: Generating initial codes	
7.5.4 Phase 3: Searching for themes	
7.5.5 Phase 4: Reviewing themes	89
7.5.6 Phase 5: Defining and naming themes	90
7.5.7 Phase six: Writing the report - Description of Key themes	91
7.6 Further themes	108
7.6.1 Procedural themes (PT)	108
7.6.2 Tutor themes	109
7.7 Discussion of relevance of Key themes to music therapy practice	111

7.7.1 KT1: Accessibility	111
7.7.2 KT2: Encourages engagement	113
7.7.3 KT3: Offers many group-work possibilities	117
7.7.4 KT4: Therapeutic effects	
7.7.5 KT5: Sensory range	120
7.7 Summary	124
Chapter 8. Music Therapy Project: Exploration of themes in a clinical setting	126
8.1 Selection of client group and setting	128
8.2 School project set-up	129
8.2.1 Choice of School	130
8.2.2 Gaining agreement of school	130
8.2.3 Relationship to existing music therapy provision	130
8.2.4 Selection of group participants	131
8.2.5 Staff Liaison	131
8.2.6 Ethical considerations	132
8.2.7 Practical set-up	134
8.2.8 Role of the teaching assistants.	137
8.2.9 School music therapists	138
8.3 Relating Procedural and Tutor themes to the school music therapy group	138
8.3.1 Procedural themes (PT)	138
8.3.2 Tutor themes (TT)	140
8.4 The gamelan therapy group	141
8.4.1 The group members	141
8.4.2 Development of therapy aims	144
8.4.3 Summarised case study	146
8.5 Review of therapy aims and outcomes:	160
8.5.1 General aims:	
o.g.i General annis.	160
8.5.3 Other outcomes	
	167
8.5.3 Other outcomes8.6 Evaluation of Key themes8.6.1 KT1 Accessibility:	167 168 168
8.5.3 Other outcomes8.6 Evaluation of Key themes	167 168 168
8.5.3 Other outcomes8.6 Evaluation of Key themes8.6.1 KT1 Accessibility:	167 168 168 170
 8.5.3 Other outcomes 8.6 Evaluation of Key themes 8.6.1 KT1 Accessibility: 8.6.2 KT2 Encourages engagement: 	167 168 168 170 172
 8.5.3 Other outcomes 8.6 Evaluation of Key themes 8.6.1 KT1 Accessibility: 8.6.2 KT2 Encourages engagement: 8.6.3 KT3 Offers many group work possibilities: 	167 168 168 170 172 174
 8.5.3 Other outcomes 8.6 Evaluation of Key themes 8.6.1 KT1 Accessibility: 8.6.2 KT2 Encourages engagement: 8.6.3 KT3 Offers many group work possibilities: 8.6.4. KT4 Therapeutic effects: 	167 168 168 170 172 174 175

Chapter 9. Synthesis of data and development of principles for the use of gamela music therapy.	
9.1 Data synthesis	181
9.1.2 Features of gamelan playing relevant to music therapy	181
9.2 Principles for the use of gamelan in music therapy	190
9.2.1. The music therapist	190
9.2.2 The therapeutic relationship	191
9.2.3 Principles for the use of gamelan in music therapy practice	192
9.3 Possible applications for the use of gamelan in music therapy practice	195
9.4 Situating gamelan within music therapy theory and practice	198
9.5 Possible clinical settings	202
9.6 Summary	205
Chapter 10 Summary and Conclusion	206
10.1 Summary of thesis	206
10.2 Addressing the gaps in knowledge and the envisaged outcomes	213
10.3 Contribution to music therapy theory	215
10.4 Limitations of the study and further indications for research.	215
10.4 Conclusion	217
References	218
Appendices	230

List of figures

Figure 1 Map of Indonesia	3
Figure 2 Results of Mapping Exercise	70
Figure 3 Chart showing analysis of tutor responses:	76
Figure 4 Final Interview Schedule	
Figure 5 Example of initial coding	
Figure 6 Example of coded text	
Figure 7 Data piles	
Figure 8 Titles of initial data groupings: Candidate themes	
Figure 9 Example of theme development	
Figure 10 Key Themes:	91
Figure 11 Procedural Themes (PT)	108
Figure 12 Tutor Themes (TT)	110
Figure 13 Summary: Accessibility	113
Figure 14 Summary: Encourages engagement	116
Figure 15 Summary: Offers many group work possibilities	119
Figure 16 Summary: Therapeutic effects	120
Figure 17 Summary: Sensory range	122
Figure 18 Summary: Cultural heritage	124

List of photos

Photo 1 Central Javanese gamelan being played in Solo, Indonesia	2
Photo 2 Balinese gamelan being played in north Bali	2
Photo 3 Full Javanese gamelan	2
Photo 4 Peking with mallet	3
Photo 5 Balinese gamelan instruments	4
Photo 6 Javanese gamelan instruments	4
Photo 7 Javanese gamelan	27
Photo 8 Set of Javanese gongs (single tuning)	27
Photo 9 Javanese bonang	
Photo 10 Melody instruments set at right angles to each other	
Photo 11 Example of carving on Balinese instrument	29
Photo 12 Layout of instruments in room	136
Photo 13 Group playing session 3	152
Photo 14 Blake playing a solo on the reyong, watched by group	153
Photo 15 Showing each other the mask	156
Photo 16 Trying the puppet out	157
Photo 17 Waking Lucy up with the puppet	159

All photos were taken by the author unless otherwise accredited.

List of appendices

Appendix A: Gamelan instruments, dance and puppet theatre	230
Appendix B: Ethics Application Form	232
Appendix C: Pilot Interview Schedule	241
Appendix D: Interview Participant forms	243
Appendix E: Interview Transcript (sample section)	247
Appendix F: Coded transcript (sample section)	249
Appendix G: Full list of candidate themes and sub-themes	254
Appendix H: Examples of thematic grouping	266
Appendix I: Example of Key themes development	268
Appendix J: School project forms	269
Appendix K: School project photos	281

Copyright declaration

AN INVESTIGATION INTO THE RELEVANCE OF GAMELAN MUSIC TO MUSIC THERAPY PRACTICE

HELEN LOTH

JULY 2014

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Chapter 1. Introduction

The inspiration for the research underlying this thesis comes from the intersection between two main aspects of my life; my professional life as a music therapist and my musical life as a gamelan musician. Having played the Indonesian gamelan for over 30 years and worked as a music therapist for almost as long, I have often thought about the connection between the two practices. At times I have become aware of the unconscious inclusion of gamelan musical forms and patterns in my improvisations occurring in music therapy sessions; I have also noticed correlations between the dynamics of group music therapy and of the gamelan groups I play in. Working with Indonesian musicians both in the UK and in Indonesia has given me insights into how the music is understood and played in its home culture which have struck me as having potential for use in music therapy. Therefore, as both a gamelan musician and a music therapist, the possibilities for combining the two practices have increasingly become of interest to me.

1.1 What is a gamelan?

Before presenting the background to this study I will first introduce the gamelan. Gamelan is a generic term to describe an ensemble of instruments on which the traditional music of Indonesia is played. An ensemble consists of tuned gongs, (suspended and horizontal), and metallophones, usually made from bronze, wooden xylophones, drums, a 2-stringed bowed instrument, a zither type instrument, bamboo flutes and singers. There are many different types of sets of instruments originating in different parts of Indonesia with different styles of music attached to them; however, they share the same basic instrument types and musical structures. A gamelan ensemble can consist of between about 5 and 25 instruments and players. The instruments are tuned to four, five or seven tone scales, and are frequently elaborately carved and painted, making them very striking to look at.

Photo 1 Central Javanese gamelan being played in Solo, Indonesia



Photo 2 Balinese gamelan being played in north Bali



Photo 3 Full Javanese gamelan



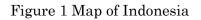
The word 'gamelan' comes from the Javanese word 'gamel' which refers to a type of hammer, like a blacksmith's hammer. (Lindsay 1979 p.9) It can also mean 'to

handle'. Therefore the name refers to the method of playing; most of the instruments are hit with mallet of some kind.

Photo 4 Peking with mallet



Indonesia is an archipelago of several thousand islands located in the oceans just north of Australia. The two principle traditions of gamelan are found in Java and Bali, two of the most populated islands.





Map courtesy of Nations Online Project

This study will focus on the use of Balinese and Javanese gamelan, including Central Javanese and West Javanese (Sundanese), as these are the instruments most commonly known of and found in the UK and the West. Full details of the instruments and music are given in Chapter 2.

Photo 5 Balinese gamelan instruments



Photo 6 Javanese gamelan instruments



1.2 Background to the study

Gamelan orchestras first arrived in the UK in the late 1970's and early 1980's in the Indonesian embassy and in university music departments, followed by a set at the Southbank Centre, a large arts centre in London. Since then the number of gamelan sets in the UK has steadily increased and there are now over a hundred sets. These are mainly being used in universities, schools, orchestral centres and community arts settings. The context of this work is broadly educational. More recently, these instruments are also being used in music groups with children and adults with a range of special needs and situations, such as those with learning disabilities or mental health problems, (Southbank Gamelan, Strathclyde and Glasgow Gamelan), the hearing impaired, (The Seashell Gamelan, Royal Schools for the Deaf, Manchester), and young offenders and prisoners, (Firebird Trust, Good Vibrations Project). Group sessions range from one-off workshops, intensive week long projects or weekly classes and are run by gamelan tutors. The aims of this work are usually described as broadly educational or musical. The workshop leaders are not music therapists and they do not claim to be doing music therapy, however, many are also making additional claims for the therapeutic benefits of this work. These can be general, such as improving communication skills (MacDonald et al 1999) or more specific, for example reducing self-harming behaviour in female prisoners (Digard, von Sponeck and Liebling, 2007).

There is only a little research into the use of gamelan with participants who have special needs, or with special populations and the overall range of perceived benefits have not been explored or studied. Sanger and Kippen (1987) reported on an experiment to integrate a Balinese Gamelan within a summer music course for the physically handicapped. The outcome of this experiment was successful and the study authors conclude that 'a particular non-Western musical tradition [Balinese Gamelan] is eminently suitable for certain kinds of music-making, notably those designed to be therapeutic in the recreational and educational senses of the word.' They make the distinction between the way the gamelan was used for this project which was for 'recreational and educational music therapy' and the practice of clinical music therapy and conclude that the success of the experiment 'suggests that a detailed investigation of the practical value of this work to the field of clinical music therapy would be well worthwhile.' (Sanger and Kippen, 1987, p.15).

More recently, an online discussion forum of international gamelan tutors in 2004 (Indonesian Performing Arts) focussed on the therapeutic uses of gamelan with children and adults with special needs; they noted that not only was there a lack of publications or programmes that addressed the therapeutic use of gamelan, but also that there was an absence of any literature to assist tutors in their educational work with special needs groups. They suggested that this was an area which needed researching.

Whilst the popularity of using gamelan with special needs' groups is increasing, there is clearly a need to better understand this work. In addition to musical and educational benefits, therapeutic benefits are being increasingly noted. This suggests that gamelan playing may have potential uses within music therapy practice. These therapeutic benefits have not been systematically investigated, or considered within the field of music therapy. There is no literature which looks at the use of gamelan playing by music therapists in the clinical music therapy setting. The small amount of research which identifies therapeutic aspects and outcomes of gamelan playing with people with special needs has not been undertaken by a music therapist or studied from the viewpoint of music therapy.

Therefore, an investigation into the overall therapeutic benefits of gamelan playing for children and adults with a range of special needs and special populations would produce new knowledge which could extend the practice of music therapy. It would also benefit gamelan tutors by increasing their understanding of some of the processes taking place within their work in this area.

1.3 Personal context of the study

As an experienced music therapist and gamelan musician, I believe I am uniquely placed to investigate the relationship between gamelan playing and music therapy, and to consider how it can be used within clinical practice. As already mentioned, I have on occasion noticed connections between these two areas in my own practice. I developed these thoughts when invited to write an essay by the on-line music therapy journal 'Voices' (Loth, 2006) about how gamelan playing had influenced my work as a music therapist. In response to this essay several trainee music therapists who are also gamelan players commented that they too have become aware of therapeutic potential for gamelan playing through their music therapy training experiences. My interest was further deepened during a series of Balinese gamelan workshops undertaken in 2009 as part of a schools' music festival entitled 'Proms in the Playground'. Within this I ran several one-off workshops for a range of mainstream primary and secondary school classes, and for a special school. I was struck by the enthusiasm with which all the children greeted the gamelan, and by their ability to play a simple piece of music within a short period of time. I quickly developed different ways to adapt the music, simplifying parts, and using hand gestures to direct the music. These were particularly effective for the classes of children with special needs. Although they needed further simplifications and

adaptations, such as putting a small instrument on a table for a wheel-chair user, and using one mallet instead of two where needed, they were able to play together as a group, respond to my signals and to produce a piece of Balinese-sounding music. The school staff were surprised by the levels of concentration and listening that these children displayed. This experience generated several thoughts within me about how gamelan could be taught to participants with a range of abilities; that there are many possibilities for adapting the music from traditional structures and for making it accessible to everyone, whether musically experienced or not. These experiences of teaching and playing gamelan, of having gamelan influence my work as a music therapist, and the suggestions of therapeutic outcomes of gamelan playing given in reports and research studies have led me to consider that researching the therapeutic use of gamelan playing would be of considerable benefit and relevance to music therapy theory and practice.

1.4 Research aims

The main aim of this study is to answer the question:

'What does the playing of gamelan music have to offer the practice of music therapy?'

This will be addressed though two sub-questions:

- 1. What are the therapeutic benefits of gamelan playing for people with special needs?
- 2. How can these benefits be applied in music therapy practice?

These two sub-questions relate to the first two parts of the study. Part one investigates the current and past use of gamelan with people who have a range of special needs and considers the therapeutic benefits of this. It looks at the literature and research relevant to this subject and then directly investigates current practice of gamelan tutors in gamelan workshops and classes. In part two, the findings of part one are taken and applied to the practice of music therapy in a series of music therapy sessions using gamelan with participants who have special needs. The participants, children with learning disabilities, were identified after completion of part one. These music therapy sessions are evaluated. In the final part of the study, a synthesis of all the data is undertaken to answer the main research question of what the playing of gamelan music has to offer the practice of music therapy. A set of principles for using gamelan in music therapy are given and suggestions made for clinical applications.

For the purposes of this study the term 'special needs groups or populations' will be used to refer to all non-mainstream groups of participants worked with by gamelan tutors. This could include children and adults with needs arising from learning difficulties, mental health problems, sensory impairments and other disabilities, in addition to those who have needs related to their circumstances, such as prisoners and young offenders.

As a music therapist with experience of both music therapy processes and gamelan practice I hope also to give a new perspective on existing gamelan studies and teaching practices. Looking at current gamelan and special needs work through the lens of music therapy could identify further therapeutic aspects or possibilities which have not been recognised by gamelan tutors, who have different aims for their work.

Furthermore, there is very little research into the use of non-western musical traditions and instruments in western music therapy. This is also an area which has been identified as lacking (Moreno, 1988) and which would be of benefit for the development of music therapy theory. Moreno argues that music therapists should learn about a wide range of world music genres and includes Balinese gamelan as an example. However, he makes suggestions for using the basic musical structures on Orff percussion instruments, rather than using the gamelan instruments themselves. Through learning about music from other cultures, therapists can broaden their musical language, and are challenged to think about their own musical assumptions and responses. This is not confined to using instruments and music from other cultures, but has relevance to music therapists working with their own instruments, or other percussion. As the composer Steve Reich wrote in his foreword to Tenzers's (2000) book on Balinese gamelan:

'Imitating the sound of non-Western music often leads to sitars in the rock band and other exotic effects. Knowing how a non-Western music is structured (particularly in terms of rhythm) can lead to a completely new and unforeseen use of one's own Western musical instruments, rhythmic structures, scales and tunings.' (Reich, 2000)

This is valuable when working with clients from a culture different to one's own; listening openly to how a client plays with their own cultural musical language and being able to respond sensitively to this, not necessarily with western diatonic harmonies or rhythms, is an important skill to develop as a music therapist. This is also relevant to include in music therapy training.

To summarise, whilst the use of gamelan is being rapidly developed in the field of music education, and special needs music workshops, it is not being explored in the area of clinical music therapy. This study therefore will differ from previous research in that it will focus on the clinical use of gamelan. It is unique in that it will be undertaken by a music therapist with experience of gamelan playing, and will give a new perspective on existing descriptions and studies.

The envisaged outcomes of this study are that it will:

- extend the practice of music therapy and the range of musical resources and responses available to therapists
- create new knowledge about how western music therapists can work with people from other cultures and musical heritages
- have relevance for the training of music therapists.
- further the understanding of special needs' work undertaken by gamelan tutors

1.5 Music therapy overview

Before giving a summary of the chapters in this thesis, I shall first give an overview of music therapy and its practice in the UK, and situate myself as a clinician and researcher within this.

Music therapy begins with the premise that human beings have an inbuilt response to music; to sounds and rhythms. The innate musicality of infants has been widely researched and the way that this is used intuitively in parent-infant communication has been described as 'Communicative Musicality' (Malloch and Trevarthen, 2000). This response to musical sounds and the impulse to use them communicatively can be invoked and utilised in music therapy with children and adults who have a range of developmental, psychological and physical conditions.

There are many definitions of music therapy which reflect the different ways the practice has developed internationally. Music therapy is described by the British Association for Music Therapy as:

'a psychological therapy which uses the unique qualities of music as a means of interaction between therapist and client. Attentive listening on the part of the therapist is combined with shared musical improvisation using instruments and voices so that people can communicate in their own musical language, whatever their level of ability.' (BAMT Fact sheet, 2012)

Improvisation and live music-making are key features of British music therapy, however, pre-composed and recorded music may also be used: 'Music therapists support the client's communications with a bespoke combination of improvised or pre-composed instrumental music and voice' (BAMT). Music therapists do not usually 'teach' music although aspects of therapeutic teaching may form part of an overall approach with particular clients.

The development of a relationship between therapist and client is central to the practice of music therapy. Therapeutic aims can be addressed through this relationship and through the musical interactions which evolve. Theoretical underpinnings include psychodynamic, humanistic and developmental. Music therapists work with a range of clients, including children and adults with learning difficulties, mental health problems, emotional and behavioural issues, adults with dementia, those who have been abused, and those with life-limiting conditions. Aims for work may include understanding and managing emotions and feelings, developing communication and self-expression, managing stress and anxiety, developing physical abilities, and maintaining or improving psychological and physical health and well-being.

A useful definition of the range of musical activities which may take place within a music therapy session is given by Bruscia (2014) using the term 'music experience': 'Music therapy is a reflexive process wherein the therapist helps the client to

optimize the client's health, using various facets of music experience and the relationships formed as the impetus for change.' (Bruscia, 2014, p.36) These music experiences, he suggests, can consist of 'listening, improvising, recreating and composing' (p.41).

Music therapy emerged as a profession in the UK during the 1950s when a range of professionals interested in the therapeutic use of music formed The Society for Music Therapy and Remedial Music (Darnley-Smith and Patey, 2003). The first training course opened in 1968 at the Guildhall School of Music and Drama and the profession achieved state registration in 1996. To practice in the UK, a music therapist needs to have completed a Post-graduate or Masters' level music therapy training course, approved by the governmental regulatory body, the Health and Care Professions Council (HCPC) and to be registered with this body. In 2014, seven different training programmes, each with their own distinct identity, were recognised by the HCPC. In addition to approving and monitoring music therapy training courses, the HCPC monitors standards of practice, professional skills, behaviour and health of registrants.

Music therapy practice in the UK includes a range of approaches and theoretical orientations. Historically, it has developed along two main strands, a psychodynamic or psychoanalytically-informed approach, and a music-centred approach (Darnley-Smith and Patey, 2003). Early pioneers of the former were Alvin with her Free Improvisational model (1975) and Priestley with her Analytical Music Therapy model (1975) and pioneers of the latter were Nordoff and Robbins with their Creative Music Therapy model (1977). Whilst both psychodynamic and music-centred approaches place music at the centre of the therapeutic encounter, a music-centred approach sees the therapeutic agent of change being the music itself, whereas in a psychodynamic approach music is viewed as being a part of a relational therapeutic process, which uses psychoanalytically-informed theories to understand this. Bruscia (1987) conceptualises the difference between these two approaches as music *as* therapy and music *in* therapy (pp.8-10).

More recently a third approach or philosophy of music therapy has emerged which uses a social model; Community Music Therapy. This approach has been developed in the UK chiefly by Ansdell and colleagues (Ansdell, 2002; Ansdell and Pavlicevic 2004; Ansdell and De Nora, 2012) and in Europe by Stige and colleagues (Stige, 2012; Stige and Aarø, 2012). Ansdell describes Community Music Therapy as 'an approach to working musically with people in context: acknowledging the social and cultural factors of their health, illness, relationships and musics. (Ansdell, 2002). The precise definition of Community Music Therapy and its relationship to other models or approaches is a subject of much debate within the music therapy profession which is outside the scope of this study. Music Therapy practice in the UK is constantly evolving, influenced by international approaches and models, leading to new ways of working and areas of practice. Examples of some of these influences include receptive techniques such as Guided Imagery in Music (Bruscia and Grocke, 2002) and therapeutic song-writing (Baker and Wigram, 2005), the use of which is increasing in the UK. This lively interchange between practitioners and researchers across the world is constantly broadening the scope and applications of music therapy. Further discussion of some of these models and approaches and the place that gamelan may have within them is given in chapter 9 (p.199).

1.5.1 Scope of practice

Many music therapists in the UK practice in educational settings, such as special schools where they work with children with learning disabilities, cerebral palsy, autism and other developmental disorders, or main stream schools where they with work with children who have emotional or behavioural difficulties, or in pupil referral units.

Inpatient, residential and community settings for adults with learning disabilities and for adults with mental health issues are also common areas of practice. A more recent area is within child and adult hospices and palliative care settings, where music therapy can help both patients and their families address the effects of living with life-limiting conditions. Music therapy is also beginning to have a presence within medical settings such as children's oncology wards and stroke units. The developments in this field led to the establishment in 2009 of an International Association for Music and Medicine and journal (www.iammonline.com) which is furthering this area of practice. There is increasing research into the use of music therapy in the field of neuro-disability; specific techniques for working with this client group, for example Neurologic Music Therapy (NMT) have been developed in which music therapists and other clinicians are training (Thaut, 2005).

Whilst in the past most music therapists in the UK were traditionally employed in statutory health (NHS) and educational settings, political and economic pressures have led to changes in the ways these are funded, and more therapists are now working for charities, in the voluntary sector and increasingly are setting up as independent providers which service commissioners can 'buy into' for music therapy treatment.

1.5.2 General principles of music therapy practice

Throughout this study I will be referring to usual music therapy practice. To contextualise this, the basic principles of music therapy practice will be outlined. Practice may vary according to the theoretical orientation and philosophy of the therapist or setting, the client group, therapeutic aims, and practical considerations, such as funding restrictions and waiting list pressure. However it is generally accepted that certain elements are required for most music therapy practice.

Bunt and Hoskyns (2002) describe the 'practical working frame' required for music therapy to take place safely. This includes the space, instruments, boundaries and the qualities of the therapeutic relationship. The framework for therapy, as described by Darnley-Smith and Patey (2003) requires regularity of sessions, time and place.

A suitable room which can comfortably hold the number of participants, is free from interruptions and has some privacy is generally required. The same room is usually used throughout the period of therapy, giving consistency to the experience. A range of tuned and un-tuned percussion instruments as well as some orchestral instruments, keyboards and world percussion which can be played by clients with no musical training are made available for use. Sessions generally take place weekly at the same time and for the same duration. Time boundaries are considered important to keep and absences are planned for. These elements contribute to the creation of a safe, therapeutic environment and form the basic framework for practice. However, there is often a need for flexibility within this according to particular circumstances or unexpected events. For example, in some settings, such as hospices, this regularity may not be appropriate or possible. Therapists may work with clients at different times and frequencies as led by the client's physical state and needs, and may be located at the bedside rather than in a separate music therapy room. In community music therapy settings, sessions may take place in a more open, social setting relevant to the nature of the work.

1.5.3 Group music therapy

Group music therapy is widely practised (Borczon, 1997; Davies and Richards, 2002; Goodman, 2007). Groups may be composed to address a single issue (for example, young adults who have an eating disorder, or people with depression) or there may be a range of referral reasons which can be usefully addressed within a group setting.

Group size is usually dictated by the needs of the clients and may also involve additional participants such as carers or support assistants. A minimum of three participants is generally accepted as usual; the more complex the physical needs of participants, the smaller the group size. Groups for verbal adult clients can be larger. Session length ranges from 20-30 minutes, for children who have a short attention span, to between one and two hours for groups of verbal adults. Frequently, the traditional psychotherapy model of a 50 minute session is used (Bunt and Hoskyns, 2002, p.32-33).

Length of treatment varies according to the client's needs and the setting. It may be open-ended and last for one or more years, or therapists may contract for a period of therapy such as 12 weeks, followed by review, at which point it is decided whether to continue with a further period of therapy. Further models include the on-going open group, which clients can attend when they wish, for example on a psychiatric acute admission ward, and the fixed membership group, which runs for a specific length of time with the same members. In addition to therapeutic needs, duration of therapy may be influenced by funding or waiting list restrictions, and by factors such as school-term length.

1.5.4 Situating myself as a researcher and practitioner

I have worked as a music therapist for nearly thirty years. My training in the UK was psychodynamic in orientation and focussed on the use of free improvisation. I also spent time training in the US and was introduced to other practices such as a behavioural approach and song-writing models. Since then, my working practice has evolved but remains broadly psychodynamic in orientation, using free and structured improvisation and songs. My previous clinical work has taken place in a range of adult mental health settings (Loth, 1996, 2002). In my current practice with groups of pre-school children who have learning disabilities and their families, I have a developmental approach, in addition to attending to the quality of the relationship between the parent and child and the dynamics of the group (Loth, 2008). Whilst I have not used gamelan music or other pre-composed musical genres in my practice, I am interested in the possibilities for these, both as a practitioner and as a researcher. As a practitioner, I am increasingly open to a broader view of music used for health purposes, and in increasing the accessibility of music to all sections of the community; therefore I began the research with an open attitude to the question of what gamelan playing might have to offer music therapy practice.

My research interests have focussed on the qualitative nature of music therapy experiences and processes. This has led to previous small-scales studies looking at how musical criteria are assessed during the selection of music therapy trainees (Loth, 2004) and how additional training in psychotherapy or counselling affects the music therapy practice of music therapists (Loth and Richards, 2007) I acknowledge that my experience and interest will inevitably have influenced how I have approached this research and informed my choice of a qualitative research methodology for this study. However, this choice was not only due to my interests, but was an intellectual choice based on the comprehensive literature review, research questions and my clinical experience. Whilst research of this kind can never be entirely objective, I have endeavoured to be aware of any possible biases I may have throughout all stages of the research process.

Throughout the study, the term 'special needs' is not used with the meaning it sometimes has as for people who have learning difficulties or for children with 'special educational needs'. In looking for a term that described the specific populations and participants of the tutor-led gamelan sessions which were investigated in the study, I considered several terms such as 'additional needs' or differently-abled', however these all had particular meanings in specific contexts. From the literature review it was clear that the gamelan workshops took place with children and adults who were grouped together because they all shared some kind of disability, mental health issues, or particular living situation; these would be too cumbersome to list each time they were referred to. Therefore, as a researcher I have decided to use the term 'special needs groups and populations' as an overarching descriptive term for the broad range of research participants.

As a clinician, I would not use the term 'special needs' to describe this range of participants as this does not accurately describe them. I recognise the importance of using accurate and respectful language in referring to people with differing needs and disabilities. As a music therapist, I may see a child with Down's syndrome because they have specific needs or difficulties which can be addressed through therapy, not simply because they have Down's syndrome. The condition itself does not describe the person or their needs. I consider that all populations, including those without any diagnosed disabilities or conditions can have particular needs at different times, which may benefit from therapeutic interventions; and that using this meaning, we can all have 'special needs' at times.

1.6 Outline of the chapters

I will now outline the following chapters.

Chapter 2 presents an overview of gamelan and describes its place in Indonesian society and culture. The ways that societal values such as community and cooperation are reflected in how the music is structured and played are outlined. The instruments and music are explained in more detail and specific characteristics of both which could have relevance to music therapy practice are suggested.

Chapter 3 looks at how gamelan playing has developed in Western societies, showing how it has become popular through its influence on composers and through the exchange of western musicians and students studying in Indonesia and Indonesian gamelan musicians and teachers bringing their expertise to the West. The development of gamelan in the United Kingdom is traced, as this is the location of the study. One reason for the proliferation of gamelan sets in the UK is its naming in the National Curriculum as an example of music from another culture that children should be taught about. This led to several education authorities purchasing their own gamelan. A review of the literature pertaining to the use of gamelan in education is summarised and benefits of playing which may have relevance for music therapy are noted.

The use of gamelan with special needs groups is explored in chapter 4. Reports of work by gamelan tutors and research studies into the effects of gamelan playing with special needs groups are reviewed. These range from descriptive accounts of work with children and adults who have physical disabilities or learning disabilities, children with autism, and with hearing impairments to research studies conducted with adults who have learning disabilities, prisoners who selfharm, children with attention disorders and studies concerned with the physiological effects of listening to gamelan music. The features identified in these accounts which could have relevance to music therapy practice are summarised.

Chapter 5 describes the methodological approach which underlies the study and the procedures chosen for data collection and analysis. This is a qualitative study which uses a naturalistic paradigm; it investigates gamelan music as it is played in Indonesia and in current western practice. The chapter outlines the research design and justifies the use of semi-structured interviews as the main research method for gathering data into the therapeutic effects of gamelan playing for people who have special needs. The reasons for choosing the data analysis method of Thematic Analysis (Braun and Clarke, 2006) are described and other qualitative methods considered. The chapter further considers ethical procedures, researcher reflexivity and situates the study within the field of music therapy research.

Before being able to investigate how gamelan is being used in current practice with people who have special needs it was first necessary to locate all gamelan activity within the United Kingdom. A mapping exercise for this purpose was conducted, which is described in chapter 6. This aimed to locate all gamelan sets, and the gamelan tutors who were involved in this work. Gamelan tutors who worked with people who have special needs were invited to answer a short series of questions about their work in an email. The replies received showed that tutors were working with a wide range of participants in a variety of settings. This exercise provided information which was used to select a purposive sample of tutors to take part in semi-structured interviews, the next stage of the study.

Chapter 7 details the procedures and methods used in the semi-structured interviews. Nine gamelan tutors were selected to be interviewed, who between them represented all the types of gamelan, participant groups and working practices identified in the mapping exercise. Within the interviews, tutors were asked to talk about a range of topics including their background and training, practical aspects of the work, what they do and why, the aims and outcomes of their work and their thoughts on the appeal of gamelan; whether it has any special qualities which make it effective in this work, and whether they consider there to be any therapeutic elements to gamelan playing. The interviews were transcribed and subjected to a thematic analysis. Six Key themes were identified which were considered to be the most relevant to the research question of what the therapeutic benefits of gamelan playing for people with special needs are. In addition, two further sets of themes were identified which whilst not relating as directly to the main research question contained information which could be relevant to the overall study and to more practical issues which relate to the research sub-question of how gamelan can be used in music therapy practice. The chapter concludes with a discussion of the relevance of the Key themes to music therapy practice.

The themes identified from the interviews are then further explored in a music therapy project undertaken by the author in a special school. Chapter 8 describes how the project was set up, considers the ethical issues involved, gives a summarised case study of the work and evaluates how well the therapeutic aims were addressed. The three sets of themes from the interview analysis are reviewed again in relation to the music therapy project and thoughts on their relevance and usefulness for clinical music therapy are refined.

An overarching data analysis is undertaken in chapter 9, which brings together the themes and ideas from all sections of the study to identify the specific features of

gamelan music which have relevance to music therapy practice. These features, their relevance to music therapy, and where in the data they have come from are detailed to answer the research question, 'What does the playing of gamelan music have to offer the practice of music therapy?' Following this, these findings are used to develop a set of general principles for the use of gamelan in music therapy. This approach is situated within music therapy theory and practice and some possible applications for clinical settings are suggested.

The study concludes with a summary of the research and the findings, shows how it has addressed the research questions and considers how this has filled gaps in knowledge and met the envisaged outcomes of the study. The contribution to music therapy theory and practice is stated and suggestions are made for further research.

I will now begin by presenting the gamelan instruments and music in more detail and describe how it is played in its original setting. I will consider its role in Indonesian society and reflect on aspects which may have relevance for music therapy practice.

Chapter 2 Gamelan in Indonesia

This chapter gives an overview of gamelan and its place in Indonesian society and culture. A brief history of Indonesia is given to contextualise the music, its development and the relationship between Javanese and Balinese gamelan. The instruments and the way the music works are further described. As explained in the previous chapter, this study is focussing on the gamelan music of Java and Bali, two adjacent islands, and the two largest traditions of gamelan in Indonesia. These are the main sets found in the West and specifically the UK, where the research is located. The core principles of gamelan are shared between the two traditions, and are described generically throughout. Where there are differences or specific qualities pertaining to one set of instruments or style of gamelan, these are identified and described.

2.1 A brief history of gamelan in Indonesia

Indonesia is an archipelago of around 13,000 to 15,000 volcanic Islands in the ocean. Over half of these are lived in by several hundred different ethnic and language groups (Spiller, 2008). These groups have their own identities, and music, and were only united as one country after the second world war, when the Republic of Indonesia was officially recognised in 1949 (Gold, 2005). Gamelan music has developed over many years, influenced by the different periods of cultural history. Both Java and Bali have a history of regional monarchies with Royal Courts and princes who governed their area of the islands and who promoted and supported the arts.

The religion of Java was originally a blend of Hinduism, Buddhism and Javanese Animism. Islam came to Java in the fourteenth century and gradually spread throughout the island. The Javanese rulers and aristocrats and who did not wish to convert to Islam fled to neighbouring Bali (Sorrell, 1990). The religion of Bali developed into a form of Balinese Hinduism (Gold, 2005); a blend of Hinduism and Buddhism, and incorporating ancient practices of ancestor worship and animism. Following the arrival of European traders, the Dutch gradually took control of the archipelago in the nineteenth century, (with a short period of British rule under Raffles from 1811 to 1816), renaming it the Dutch East Indies. During the second world war the Japanese displaced the Dutch and occupied the Islands between 1942-1945. This was followed by a war of independence when, following the departure of the Japanese the Dutch tried to retake control of Indonesia (supported by the British) whilst the Indonesians fought for independence. The Republic of Indonesia was finally recognised in 1949. Whilst Java became largely Islamic, Bali, incorporating the fleeing Javanese, remained largely Hindu. All of these moves contribute to the range of music one finds in these two islands today. Although there are many differences, they remain very connected and Balinese music can trace its origins to Java. The instruments, tuning systems and the way the music is broadly organised are quite similar.

As in Java, before the Dutch rule of the 1900's, Bali was divided into several small kingdoms, within which was a royal court and smaller palaces. These courts and palaces were cultural centres which housed large gamelans, dancers, artists and craftsmen. Under Dutch rule the kingdoms were gradually broken up and the palaces disempowered. Eventually, most of the gamelans became the property of villages, which continues to be the situation in Bali today (McPhee, 1966). Gamelan music remains very widespread across the Island.

In Java, the Dutch reduced the governing roles of the Royal Courts, and those which remained 'developed music and arts as symbols of their power and influence.' (Spiller, 2008, p.45). The courts of Jogjakarta and Surakarta (commonly known as Solo) are still active and house the two main gamelan styles of central Java. In Java there has been a huge period of change since Independence; urbanisation, 'Indonesianisation', (the creation of an Indonesian identity, as opposed to the different ethnic groups of which it is made up), westernisation, modern mass communications and commercialism have all had an effect on the way music is seen and learnt in the country. As the power of the Royal Courts declined, so did their patronage of the Arts, and state music and dance schools and academies were established in both Java and Bali, becoming the new centres of musical training, preserving the Javanese classical court tradition (Roth, 1987) and Balinese gamelan styles (Gold, 2005). Bali has developed and been promoted as a centre of cultural tourism, with music and the arts a central factor in this, which has also helped to preserve the music.

2.2 Gamelan music in context

Gamelan music is linked to many aspects of life and religion in Indonesia. It is an essential accompaniment to dance, various forms of theatre such as dance-drama, and shadow-puppet plays (wayang kulit), which are widely practised arts. The range of settings and purposes of gamelan playing in Java include 'entertainment, ritual, education, meditation or commemoration of special events.' (Brinner, 2008, p.4) It is played at funerals, weddings and many other occasions. Whilst there are some performances which are purely musical, called 'klenèngan' these are usually given in the context of some sort of celebration, and generally, the music is played with another art form.

In Bali, the gamelan is an essential part of village life and the life of the temple, of which every village has at least three (Gold, 2005). Many festivals and ceremonies take place in these temples throughout the year and mark religious events, as well as important occasions such as births, deaths, and auspicious days, when the various cyclical calendars coincide (Gold, 2005). Tenzer (1998) writes: 'Music is ubiquitous in Bali: its abundance is far out of proportion to the dimensions of the island. The Hindu-Balinese religion requires gamelan for the successful completion of most of the tens of thousands of ceremonies undertaken yearly.' (Tenzer, 1998, p.12). In addition to these sacred musical events, gamelan in Bali is also played at many secular events, for performance to dignitaries and in gamelan competitions and festivals.

The prevalence of gamelan in Bali is to some extent traced by Tenzer (2000) to the geo-cultural roots of Balinese music. He stresses the importance of working the land and the rice paddy fields collectively, and suggests that because the people had enough to eat and did not have to spend all their time 'surviving', they could spend the evenings singing and playing and preparing for festivals (Tenzer, 2000, p.73). The relevance of agriculture to music were described to me by Wayan Dibia, an eminent Balinese gamelan teacher, author and former director of the academy of music and dance in Bali (STSI). He explained how playing gamelan was a very important way to fill leisure time in the past. A gamelan would be kept in a shed next to the rice fields. Whilst waiting for the rice to be ready to harvest, and in the evenings of the harvest, the gamelan would be brought out and the men would

play, often all day, together. Once the harvest was over, the gamelan would be packed away again. (Dibia, 2008, personal communication)

2.2.1 Other music of Indonesia

It should be noted that gamelan is not the only music played and listened to in Indonesia. In addition to the popularity of western popular music, there are also several hybrids of western and Indonesian styles, combining different languages, scales and instruments (Spiller 2008). However, as Spiller notes: 'Despite these innovations...gamelan music remains an important expressive form for many Sundanese, Javanese and Balinese people.' (Spiller, 2008, p.105).

2.2.2 Place in contemporary society

Whilst gamelan is frequently played in towns and villages as part of life as described earlier, there is also a culture of tourist performances. Gold (2005), describes how with the rise in tourism and visitors wanting to hear and see the music and theatrical performances, the Balinese had to find a way to prevent the sacred performing arts from being exploited. In traditional culture there is no distinction between sacred and secular life. To protect sacred performances intended for the gods from being conducted for money in non-sacred sites, a system was drawn up to place performing arts into three categories; sacred, ceremonial and secular. However the idea of a tourist performance being secular is not entirely accurate as all performances are considered to be sacred to a certain extent, and played for the gods, for a 'divine audience' (Dibia, 1992 cited in Gold, 2005, p.18). There are now many tourist performances given in Bali, which are an important source of income for musicians and dancers.

In Java, in addition to the court gamelan and music schools and academies, there are many amateur groups. Javanese children learn some simple gamelan in school, and some continue to play in adulthood in these groups. Many businesses and workplaces have their own gamelan group, which mainly serves a social function; this is somewhere to meet and talk together, as well as play some music, generally led by a professional musician (Brinner 2008). Groups are usually gender specific, and whilst traditionally mainly male groups exist, there has been an increase in all-female gamelan groups in both Java and Bali. An important feature of social gamelan playing in Java is that all classes and castes can mix; the traditional hierarchies are broken down. A long-standing source of gamelan performance in Java has been the official radio station RRI in Solo. This employs gamelan musicians and singers and gives regular weekly performances, which are broadcast and listened to by many.

2.2.3 Reflections of the music in society

Many western and Indonesian writers have pointed out the links between the communal aspects of Indonesian society and gamelan music: 'Gamelan music in Java and Bali provides a model of traditional society in sonic form.' (Spiller, 2008, p.105). Central to Indonesian society is the importance of the community, and the value given to collectiveness over individuality. Brinner (1995) describes how the ensemble nature of the music reflects the values and working of society describing the basic Javanese social concepts which can be applied to the music as '*rukun*, (meaning compatibility or cooperation) and *gotong royong* (meaning mutual cooperation, working together in harmony)' (Brinner, 1995, p.292). These values apply to many areas of life, and are integral to the successful playing of the music. In addition, Brinner links the Javanese behavioural ideal of refinement and a calm manner to the music: 'Ideally a Javanese person strives to maintain equilibrium verbally, physically, and emotionally.' (Brinner, 1995, p.293). This is an ideal in good performance too.

Describing Balinese gamelan, Gold (2005) links cultural values and the music explicitly: 'Balinese music is primarily an ensemble tradition, reflecting the value placed on group identity over individual expression and also reflecting, to a certain extent, the cooperative nature of Balinese social organisation.' (Gold, 2005, pp.3-4) She identifies two further themes relevant to Balinese performance and society: that the arts are completely integrated, with music being inherently theatrical, 'with the ability to move a community and shape a ritual event' and that current performances are 'intrinsically linked' to Balinese identity, linking the past and present (Gold, 2005 p.4).

All villages in Bali have a 'Banjar', a community organisation in which all are expected to participate and which governs life in the village. Individuals have specific roles within it. Each Banjar owns at least one, and often more, sets of gamelan, and playing in these gamelan is considered a sought-after honour (Tenzer, 2000). The gamelan plays at all the many temple ceremonies of the village and for other social events and rituals.

Tenzer describes gotong royong as 'the practice of mutual help' (Tenzer, 1998, p.105), which as well as being key to the function of the Banjar (and by extension, the whole of society) is at the root of Balinese music: 'The close coordination between the gamelan's melodic parts, and the interlocking of the kotekans [fast, elaborating figures shared between two players] demand a close interaction between the players during rehearsal that is analogous to the larger structure of the society.' (Tenzer, 1998, p.105). Similarly, Spiller states that 'Gamelan organisation is like social organisation. The fast interlocking parts mirror the close cooperation that villagers have cultivated to keep their communities running smoothly.' (Spiller 2008, p.101). Davies (2007) extends this further suggesting that in addition to the pairing of instruments and interlocking parts 'the social aspect of the orchestra is apparent in elements of the musical form.' (Davies, 2007, p.26).

Whilst noting that Javanese gamelan music is often considered as expressing not only the 'essence' of Javanese identity, but the 'way of being', Brinner warns against the idealisation and simplification of this view, pointing out that cultural practices are influenced by a range of factors and can change over time (Brinner, 1995). Bali can also be viewed as an idyllic harmonious culture, as detailed by Hobart (2011) who suggests that the viewing of culture as a commodity has led to Bali becoming a 'brand'. These warnings against idealisation are relevant in both Java and Bali; gamelan groups can still contain rivalries and discord, as with any other groups of people. In Bali, gamelan playing is also very competitive; many groups take part in competitions. However, the nature of the music is to work cooperatively and harmoniously together as a group. As the renowned Javanese composer and musician Supanggah answered when asked about the philosophy of the music, "Javanese music had a profound meaning. Inferred examples of this profound meaning are tolerance, openness, respecting differences and respect for others." (Abdilah, 2007).

2.2.4 Cycles

Most gamelan music is cyclical, as will be explained in the next section. This reflects the way time is viewed as cyclical in life in Indonesia. Several writers describe how cycles underpin many aspects of Indonesian life (Becker, 1980; Gold, 2005; Brinner, 2008). The Balinese year is 210 days, made up of ten simultaneous weekly calendars which are understood as repeating cycles of varying lengths. There are various other longer cycles which can be as long as many years. Similarly in Java there are several calendric cycles of differing lengths. Auspicious days (good and bad) result from the coinciding of days from different calendars. Therefore a priest is consulted to choose a date for important events such as an important ceremony. This belief also extends to the quality of days, so that someone would be expected to be, for example, a good dancer because of the day they were born on. The coincidence of significant days from different calendric cycles can be seen to be reflected in gamelan music, where, for example, cycles of melodic patterns of differing lengths all converge on to a large gong note, marking the end of a section or piece. Tenzer (1998) characterises the repeating cycles of Balinese music as regenerative, linking this to reincarnation, a fundamental belief of this society. I will now describe the instruments and music in more detail.

2.3 The Instruments

As discussed in the introduction, whilst there is a wide range of instruments and gamelan types in Indonesia, I will be focussing on the most widely played gamelan sets of central Java and of Bali. These are the sets most commonly used in the UK. There are two main groups of instruments, those with bars or plates (metallophone-like) and knobbed instruments – mainly gongs, and gong-like instruments. They are mainly made from metal, with wooden frames. The metal is typically bronze, which produces the best sounds, or iron, which is much cheaper to produce. These instruments are struck with a range of mallet types – each specific to that instrument. They are mostly made from wood, either with a wooden end or a padded end. Stick-like mallets are wrapped in string.

Photo 7 Javanese gamelan



The barred melody-playing instruments have between 4 and 7 keys, of one scale and octave. The instruments range from low, to high, across four octaves. In addition to the large gong, which can be a metre in diameter, there are mid-range hanging gongs, also marking the ends of phrases, and in Javanese Gamelan, a series of gongs tuned to each note of the scale which provide further punctuation.



Photo 8 Set of Javanese gongs (single tuning)

There are also horizontal or 'sitting' types of gong, large ones also tuned to the scale in Java (kenong) which are part of the colotomic structure, and rows of horizontal gongs strung on ropes over a wooden frame played with two stick-like mallets, which function as elaborating instruments. These are played by two players in interlocking parts on two instruments, one octave apart (Javanese bonang) or by four players on one instrument (Balinese reyong).

Photo 9 Javanese bonang



Further elaborating instruments include bronze barred instruments of over 2 octaves played with two mallets (gender), a wooden-barred xylophone (gambang), bamboo flutes, (suling) a 2-stringed bowed instrument (rebab), a small plucked zither (siter).

An ensemble can range from five to six instruments to a full set of over thirty players. Singing is also an important component of gamelan with solo female 'psinden' singers, and a male chorus, with players often joining in with this. A full Javanese gamelan consists of instruments of both tunings, mostly positioned at right angles to each other. This means that if the tuning changes within a suite of pieces the players can make a 90 degree turn to continue.

Photo 10 Melody instruments set at right angles to each other



The instruments' frames are often highly decorative. The wood is usually carved and or painted. Carvings may be of flowers and leaves, or contain animals or birds of spiritual significance or protecting spirits, or they may be of scenes from the Mahabharata or Ramayana tales. They are often also adorned with gold leaf.

Photo 11 Example of carving on Balinese instrument



Further images of gamelan instruments, dance and puppet theatre are given in appendix A

2.3.1 Types of gamelan

Whilst the gamelan of Java and Bali have several differences, as shown, they are also closely related; the instruments, tuning systems and the way the music is broadly organised are quite similar. There is more difference in the music that is produced from these which can be viewed as relating to the differences between the Javanese and Balinese people. Tenzer (1998) writes that the music 'reflects the vast differences between their cultures and the temperaments of their peoples. Both are highly sophisticated, but while the courtly Javanese music is reflective, subdued and wide open to the contributions of the individual performers' lovingly crafted improvisations, Balinese music - especially that of the 20th century - is a juggernaut of brash and aggressive energy, deriving much of its effect from virtuoso ensemble coordination and dramatic contrasts in mood.' (Tenzer, 1998, p.19).

2.3.2 Tuning

Each set of gamelan instruments is tuned to a specific scale. There are two sets of tunings which are known, both in Java and Bali as 'pelog' and 'slendro'. Pelog is seven-note system with notes separated by a series of unequal intervals. It is usually grouped into a mode of 5 notes, using either the upper or lower note of the scale. Slendro a five-note system based on roughly equal intervals. Different sets of Balinese gamelan have tunings derived from these scales, which may be 4, 5 or 7 toned. There is no agreed 'norm' for tuning, unlike in western music with A=440 vibrations per second. Although there is a generally agreed set of guidelines for

intervals within each tuning, each gamelan set is tuned to itself; it is unique and has its own characteristics, therefore instruments from different sets cannot play together.

A key difference between the tunings of Javanese and Balinese gamelan is that in Balinese gamelan the instruments are paired and tuned slightly apart. Each matched pair has a male and female instrument, with the female tuned slightly lower than the male. When both instruments of the pair play the same note, the sound waves they produce are moving at slightly different speeds and an acoustical 'beating' occurs, a shimmering or pulsating sound as the sound waves oscillate (Tenzer, 1998). The difference in beating rate will sound larger in the lower instruments than in the higher register instruments. Tenzer makes the point that the synchronised western tuning would, to the Balinese musician, be considered 'wan and lifeless' whereas the paired tuning 'makes the tones seem agitated and charged with pulsations.' (Tenzer, 1998, p.33). The interlocking parts of Balinese music are played in these male –female pairings. Although to Western ears the individual instruments can sound out of tune with each other, the effect is different when a full gamelan is playing. As Tenzer comments, 'the complexities of the tuning add a great deal to the intense visceral effect of the music.' (Tenzer, 1998, p.33).

2.3.3 Sound qualities

Most instruments of the gamelan have a long sustain time with varying attack and decay times. Each instrument has its own acoustical qualities, with different resonators, some with a box resonator, some with bamboo or metal tube resonators. The gongs reverberate with a huge range of frequencies according to their size, the large gong having a very deep and slow reverberation. Detailed analyses of the acoustic qualities of the instruments can be found in Sethares, W.A. (1995) 'Tuning Timbre, Spectrum, Scale'.

2.3.4 Playing techniques

The barred instruments are struck with a wooden mallet, held in one hand. A key aspect to playing is that each note must be damped before the playing of the next note, to prevent the sounds merging into each other. Because of the resonance of the instruments, without damping, the sounds quickly blur together. The note is damped by pinching the bar between the thumb and fore-finger of the left hand, at the same time as playing the next note. In this way the left hand follows the right hand around the keys. The faster the music, particularly in Balinese gamelan playing, the more accurate the damping needs to be. When playing interlocking parts, the damping occurs in between notes to leave space for the other part. When playing some slow Javanese music, the damping is not quite so crucial and can be done by touching the bar rather than pinching it. Some of the barred elaborating instruments are played with mallets in both hands, necessitating more complex damping using other parts of the hand. Hanging gongs are played with large padded mallets and horizontal gongs with padded stick mallets, wrapped with string; damping is also required for these instruments, achieved using the mallets.

2.4 Overall structure of the music

The music of gamelan in Java and Bali share a basic structure. This comprises the core melody (or series of melodies), the gongs marking subdivisions of the melody, (scaffolding), the elaborations of the core melody, and the drumming patterns. Spiller (2008) describes these as 'musical "layers" that remain distinct from one another yet combine to create a harmonious whole.' (Spiller, 2008, p.44) these layers he defines as the underlying cycle, the rhythmic control (drumming), the main melody and the elaboration. Pieces have differing musical forms, modes and tunings. Given the core melody or musical outline of a piece, a musician will be able to construct all the other parts according to known conventions of the types of pieces and roles of instruments. About Javanese music Roth (1987) summarises:

'The full texture of a piece – a complex polyphony of many parts – could be said to be 'realised' from the fixed melody in the same sense that a western musician would 'realise' a baroque continuo part, or a jazz musician 'realise' a standard tune. Thus each player interprets the fixed melody according to the techniques and playing style of his instrument, its function within the ensemble, the form of the music and its tonality, the speed at which the fixed melody is moving (irama), the tempo, certain standard melodic patterns, what the other instruments are doing.' (Roth, 1987)

2.4.1 Colotomic structure

The base layer of a piece is formed by the structure of large and small gongs. Western musicologists have used the term 'colotomic structure', from the Greek work 'colon' meaning arm or limb, to describe the technique of using gongs to define the structural form (Tenzer 1998). Almost all gamelan music, whether Balinese or Javanese uses gongs to mark structural points in the music, in particular a large gong to mark the beginnings and ends of phrases or sections, and smaller gongs to mark the sub-divisions of these. In Balinese gamelan there is also often a small damped gong played which keeps a steady beat, a kempli or kajar. Most of the musical forms used are cyclic, and are determined by the punctuation of the large gong. Phrases can last for 8, 16, 32 and so on beats, to 256 beats in the larger forms. The large gong plays at the end of each cycle, whilst a range of smaller gongs mark sub-divisions of these phrases or gong cycles. The music tends to be 'end-weighted' (Spiller, 2008) with all the parts leading towards the last note of the cycle, marked by the large gong; 'listeners hear the rhythms, melodies and elaborations all propelling towards an inevitable and satisfying end.' (Spiller, 2008, p.72). Describing how the smaller gongs mark sub-divisions of phrases, Tenzer (1998) writes 'The sense of expectation engendered by such equal time divisions makes the arrival of the final gong a very satisfying event' (Tenzer, 1998, p.43). The gong framework is an extremely important reference for the musicians, who always know where a part fits in relation to the gong pattern (Gold, 2005). Tenzer (1998) talks of the music being 'grounded' by the large gong and the smaller beat keeper, and describes how 'reassuring' they are to the musicians (Tenzer, 1998, p.42).

2.4.2 Core melody

The basic melodic phrase of a piece, known as the 'balungan' is played by various barred instruments. This is the phrase which is often notated, serving as a sort of shorthand for musicians to realise their parts from. A piece is often made up of a series of the phrases. There is much debate amongst Javanese gamelan musicians and scholars about whether the balungan really is the core melody, or whether the core melody is actually implied through an 'inner melody' (Sumarsan, 1975 cited in Spiller 2008; Brinner, 2008) also called a 'hidden melody' or 'unplayed melody' (Perlman 2004). This abstract melody is conceptualised by the musicians who use it to work out their elaborated parts, but it is never actually played on any one instrument. Similarly in Balinese gamelan, whilst the core melody is played by one particular type of instrument, the melody a Balinese person would sing if asked for the main melody would be 'buried in the middle of the texture' (Tenzer, 1998 p.44).

2.4.3 Elaborations of melody

The elaborating instruments will each derive their parts from the notes and contour of the balungan (or 'inner melody'), according to both the mode (pathet) of the piece and the specific musical vocabulary of the instrument. The elaboration also depends on tempo of the piece at that point, and usually anticipates important notes. Most of the elaborating instruments play in a metrical division (2, 4, 8, 16, 32 times) of the melody beat. Exceptions to this are the bowed instrument (rebab) the solo female singer, (psindhen) and the flute, (suling). These elaborations are more rhythmically free, although they still follow melodic rules and patterns. There is very little free improvisation in Balinese and Javanese music. There are variations on set patterns which the elaborating instruments would play for particular melodic phrases, so to this extent there is some idiomatic improvisation within a framework.

The principle of interlocking parts is a key feature of Balinese music (and to a lesser extent in Javanese music). The melodic barred instruments play complementary rhythmic lines which together form one very complex line.

2.4.4 Role of the drums

The drum plays a range of simple to extremely complex patterns. The drummer is responsible for establishing the tempo of a piece, signalling changes in tempo, cueing the beginning and ending of it, and coordinating the music with other activities it is accompanying, such as dance or shadow puppets. Javanese gamelan uses two or three different sized drums played by a single drummer, whereas Balinese gamelan uses a pair of drums played by two players, with interlocking parts. There is no 'conductor' in gamelan music. The drum player generally leads the playing and gives many different drum signals to tell the musicians what is going to happen next. Other instruments also give leads at different points. This means that listening is a vital part of playing.

2.5 Conventions and concepts of playing

There are some particular conventions in gamelan playing and ways of thinking about the music which differ from much western musical practice.

2.5.1 Etiquette

There are certain rules of behaviour around gamelan instruments, which all musicians know to observe. Shoes are removed before playing (as they are before entering a house in Indonesian) the instruments should not be touched with the feet, and should not be stepped over. This breaks the connection between the instruments and the spirits, and player must apologise to the instruments if this happens. Mallets should be placed on the instruments, not on the ground after playing. The spirit of the gamelan is thought to be embodied in the large gong, and offerings of flowers or food are often made to the gong before performances and on important days (Pickvance, 2005).

2.5.2 Group playing

One of the most important aspects of a gamelan performance is the ensemble feeling, the 'laya' (Tenzer, 1998, p.49). It is not considered enough to just play accurately, the group has to feel and respond together to the speed ups and slow downs, and to sudden changes in dynamics. As there is no single conductor to watch who is giving these directions as in a Western orchestra, the group feeling gains real significance. Although the drummer or a lead musician is giving signals within the music, these have to be heard and interpreted as a whole. As Tenzer (1998) puts it 'The music and the musicians must breathe together.' (Tenzer, 1998, p.49). Similarly, gamelan playing does not allow for individual expression or overt displays of virtuosity; 'the ideal is the cultivation of absolute coordination and channelling of each member's artistic personality into a unified musical expression.' (Tenzer, 1998, p.14). The complex interactions involved in playing Javanese gamelan music are explored in detail by Brinner (1995) who uses an indepth analysis of Javanese gamelan playing to develop a theory of musical competence and interaction.

2.5.3 Rasa

The concept of 'Rasa' is important to gamelan playing. The exact translation of this word is much debated amongst scholars of gamelan music. Walton (2007) describes its basic meaning as 'feeling' which can refer to taste, touch and emotional feelings. In music it is often understood as referring to 'musical affect' or 'emotion' (Benamou, 2010) 'inner meaning' (Walton, 2007) or 'mood' (Pickvance, 2005). Pieces of music express different Rasa, and the musicians should convey these through their playing. Compositions can be categorised by their Rasa, which could include 'sad pieces, exuberant pieces, flirtatious pieces, and so forth.' (Walton, 2007, p.35). Rasa and its links to Javanese mystical traditions are explored in Walton (2007); 'Aesthetic and Spiritual Correlations in Javanese Gamelan Music' and its role within the music by Benamou (2010); 'Rasa. Affect and Intuition in Javanese Musical Aesthetics'.

2.5.4 Learning styles

Gamelan music is primarily an oral tradition. The music is passed down through the generations, from master to pupil. A basic form of notation has been developed, but is not much used. As described earlier, this is usually the skeleton of the melody. Musicians learn aurally, listening to and imitating and singing a part repetitively until they have committed it to memory. The music is always played and performed from memory. The way in which children learn to play gamelan in Bali reflects also the way society works to some extent. Within the Banjar (the village community association) the children are encouraged to learn the music, being welcome at rehearsals and continually be exposed to the music. They may sit of a father's lap whilst he is playing, and gradually absorb and mimic the playing on their own, as the instruments are available to all to use. They learn through the constant repetition of the music.

2.6 Summary

This chapter has presented a brief history of gamelan in Indonesia and shown the context for its playing in the past and currently. It has considered how societal structure and values are reflected in the music and how it is played. The instruments of Central Javanese and Balinese gamelan have been described and the structure of the music outlined. Specific characteristics of gamelan playing and the music which differentiate it from much of western music, such as the group playing style, the concept of 'Rasa' and the learning styles have been elaborated upon.

Considering the nature of gamelan music and instruments, and its context in relation to the focus of this study, several aspects could have relevance its potential use in music therapy practice. The communal nature of the music, and the importance of cooperation and respect in playing may relate to therapeutic goals in group music therapy; however, as individual expression is a frequent aim in music therapy, this aspect may be unhelpful. If using gamelan in music therapy, the different moods or 'rasa' of pieces and the different types and styles of gamelan which express different cultures and temperaments could all be employed for specific therapeutic purposes.

The relative simplicity of playing the instruments, and aural, imitative learning of the music, suggest that it would be an easy and accessible form of music making in music therapy. Similarly the repetitive and cyclical structure of music makes it easy to learn. The lack of a conductor emphasises the need for listening to others, which may be a developmental skill being addressed in music therapy. The instruments, being pre-tuned, cater for a range of abilities and experience levels, which is also important in therapy settings, and the timbres and sound waves may have some therapeutic relevance.

I will now look at the history and development of gamelan playing in the West, and in particular in the UK. I will trace its arrival and influence on composers and musician in the West, and describe the effects of its inclusion in educational curriculum.

Chapter 3. Gamelan in the West

In this chapter I will describe the introduction of Gamelan to western cultures and trace the spread of knowledge and playing through its influence on western composers, musicians, and ethnomusicologists. I will then focus on the development of gamelan playing in the UK and its use within the education curriculum.

3.1 History

The earliest recorded reference to a European hearing gamelan is of Sir Francis Drake, an English sea captain, navigator and politician of the Elizabethan era, who explored much of the world. An entry in the logbook of his ship, the Golden Hind, in 1580, described a visit by a local ruler from the south coast of Java, who brought some musicians to Drake's ship. It is assumed, but cannot be verified, that this was a gamelan ensemble (Sorrell, 1990). The first set of instruments known to be brought to the UK was by Sir Thomas Raffles (1781- 1826) a British statesman involved in the defeat of Java by the Dutch and French during Napoleonic wars and instrumental in the founding of Singapore. Raffles took great interest in the music and culture of Indonesia and sent instruments and puppets home to Britain; the gamelan however was not played. Some of his collection is now housed in the Horniman Museum in London.

The Dutch colonisation of Indonesia in the nineteenth century brought Europeans to the islands and the music to European attention. During this period the Dutch brought in a policy of preservation of Balinese culture and opened up the country to the first western tourists (Gold, 2005). The development of tourism in Bali grew from this point and it continues to be a highly popular destination today. Several anthropologists and artists came to the Islands in the 1920's. In the 1930's many foreign scholars were also attracted to Bali, including musicologists and composers. The Canadian composer Colin McPhee lived in Bali for several years and undertook a large amount of musical research there. This resulted in his writing of an important book, Music in Bali (McPhee, 1966) in which he describes and analyses many forms of Balinese Gamelan. He also composed several works influenced by gamelan whilst living in Bali which were heard in the West. The first performance of a full Javanese gamelan in Europe was in 1879 at the National and Colonial Industrial Exhibition in Netherlands with musicians from Surakarta in Java, (Cohen, 2007). In the years following, Javanese gamelan regularly appeared in the context of world fairs and international exhibitions. The first Balinese performance was at the Colonial Exposition in Paris in 1931. Europeans living in the colonies, in particular the Dutch were interested in the music and there were some instances of Europeans studying gamelan in Java in the 19th century, and writing music combining gamelan and European instruments. There is not much evidence of gamelan being played in Europe until after the second world war. Indonesian students studying in the Netherlands started cultural groups and played music in the 1920's and these developed into performance groups. Indonesian politics also influenced the development of gamelan in the west; during the rule of President Soekarno there was less interest in cultural diplomacy with western Europe. However, according to Cohen (2007) during the reign of President Soeharto, who came to power after Soekarno in 1966, there was a cultural movement towards western Europe, and Indonesia 'prioritised the performing arts as a means for the establishing closer international relations with the west.' (Cohen, 2007, p.13).

3.2 Gamelan and western composers

Gamelan has inspired and influenced western composers and musicians over many years and across different styles; they have incorporated ideas from it in their compositions to differing degrees.

Debussy heard Javanese gamelan in the late 1880's at the Grand Universal Exhibitions in Paris. Whilst there is some disagreement amongst academics about when exactly this was and whether it was central Javanese or west Javanese (Sundanese) gamelan, he was evidently very interested in what he heard, and it had some influence on his composition. Writing about the music in the Revue S.I.M. (1913) Debussy enthused: 'Javanese music is based on a type of counterpoint by comparison with which that of Palestrina is child's play.' (Debussy, 1913, cited in Sorrell, 1990, p.2). Messiaen incorporated some gamelan musical extracts and ideas into his Turangalila symphony in 1949. Britten spent time in Bali studying the music and used many gamelan ideas in his work. Imitations of Balinese music can be heard in his ballet, Prince of the Pagodas, but he was also very interested in gamelan techniques and textures (Sorrell, 1990). In a letter to Imogen Holst written from Bali in 1956 he remarked: 'The music is fantastically rich – melodically, rhythmically, texture (such orchestration!) and above all formally. It's a remarkable culture...at last I'm beginning to catch on to the technique, but it's about as complicated as Schoenberg.' (Britten, 1956, cited in Sorrell, 1990, p.8).

Other composers influenced by gamelan music include Maurice Ravel, Bela Bartok, Percy Grainger, Henry Cowell, Francis Poulenc, Colin McPhee, Harry Partch, John Cage, Lou Harrison and Pierre Boulez (Sorrell, 1990; Cooke, 1998; Spiller, 2008; Locke, 2009). Many composers had easy access to gamelan in the US (Spiller, 2008) and it had an influence on the minimalists. Steve Reich studied Balinese gamelan; Lou Harrison created the first set of gamelan instruments in just-intonation, and many of his compositions combine this with western instruments. Other groups have developed this idea, creating their own sets out of different materials. The contemporary Dutch composer Sinta Wullur commissioned the making of a full diatonic set of Javanese style gamelan instruments (two rows as in a piano keyboard), for which she has written many compositions, combining the gamelan with string quartet, voice, western percussion, as well as other eastern instruments such as the Indian Sitar (Raemer, 2004). Composing for gamelan, alone and in combination with other instruments continues to develop in the UK and the rest of the western world, as indeed it does in Indonesia.

3.3 Gamelan in the US

The development of gamelan in the UK was predated by its establishment in the US. Sorrell states that a far greater interest in gamelan music was first shown outside Europe, not only in the US but also in Australia, New Zealand and Japan (Sorrell 1990). The first western International Gamelan Festival was held in 1986 at the Expo in Vancouver, Canada. In the late 1950's, the first Balinese gamelan to be exported to the US for ethnomusicology study was bought by the University of California at Los Angeles Music Department, shortly before Colin McPhee joined

the department. (Tenzer, 1998) At the time, Tenzer notes, it was 'considered unorthodox for students to learn about the music of another culture by actually playing its instruments.' (Tenzer, 1998, p.126). However, this idea quickly proved popular. It was given the name 'bi-musicality' by the ethnomusicologist Mantle Hood, and following the establishments of the arts academies in Bali and Java a few years later, a trend for US students to study abroad for periods of time grew. This led to the development of the model of student ensembles in the West directed by Indonesian masters, which have been developed in many countries (Tenzer, 1998, p.126). This model was later taken up in the UK.

3.4 Gamelan in the UK

The first full Javanese gamelan in the UK was brought from Solo in central Java to the Indonesian Embassy in London in 1977. Prior to this there had been a few concerts by visiting Javanese and Balinese gamelan orchestras, one of the most notable being a tour of Balinese musicians and dancers organised by British entrepreneur John Coast in 1952 which performed with great success in London and New York (Tenzer, 1998). Some British musicians and music lecturers learnt gamelan in other countries such as the US and were keen to continue playing (Sorrell, 2010). Gamelan orchestras and musicians were brought to the Durham Oriental Music Festivals in the early 1980's and after a set of instruments from one group was retained by Durham University, it began to be played more regularly in the UK. This was followed by the founding of the English Gamelan Orchestra at York University (who purchased their own set in 1981). Balinese gamelans were established at Dartington College of Arts, Devon in 1980, and at Queen's University, Belfast in 1982. During the 1980's the Indonesian government gifted Javanese gamelan to the Universities of Oxford and Cambridge, followed by a set to the Southbank Centre in London presented in 1987. Since then, many gamelan sets have arrived in the UK, bought by education authorities, universities, museums, arts and orchestral centres and community organisations. There are now thought to be in the region of 100 gamelan, the majority Javanese, in the UK, used by a range of groups including performing and community groups, for adult education programmes, school groups and special needs classes. Several orchestras have purchased gamelan for their education programmes which are used in a range of ways such as for family music days, evening classes and outreach projects. In

addition to its large gamelan education programme, The Southbank Centre in London has hosted several international gamelan festivals, bringing gamelan groups together from the UK and Indonesia and enabling the music to be heard by wide audiences.

This brief overview of the history of gamelan in the West and its influence on western composition has shown how it has become increasingly familiar within the musical world. The development of gamelan in the UK has been mirrored in many countries of the world where it has become very popular. There is also a constant flow of Indonesian musicians and dancers being brought to teach on western gamelan programmes and western students travelling to Indonesia to learn music and dance there. I will now look at how gamelan has been used in the UK education sector, the development of which is largely responsible for its familiarity in the UK.

3.5 Gamelan in Education

Gamelan has been recognised in the UK as a highly useful tool to use to teach children basic musicianship. A major factor in the proliferation of gamelan sets during the 1980's is that it was mentioned in the National Curriculum as an example of music from another culture that children should be taught about. This led to several education authorities buying their own gamelan. Several music educators have written about the subject, and educational text books and workbooks have been produced for use in schools, some of which involve adapting the music so that it can be played on classroom percussion instruments or electronic keyboards, whilst still retaining the principles and compositional techniques of gamelan music (Hiscock and Metcalfe, 1998).

Ruffer (1998) takes the view that learning the gamelan can be about far more than fulfilling the National Curriculum objective to recognise music from other cultures and from different parts of the world. He uses it to develop a large range of musical skills and address parts of the Curriculum 'Programme of Study', such as for teaching the elements of pitch, duration, dynamics, tempo, timbre, texture and structure, for individual, pair and group-work, and in particular, to address the targets of performing and composing and for listening and appraising. He uses the gamelan as a starting point for composition project which has at its heart 'an exploration of the idea of structure, texture or mode' (Ruffer, 1998, p.4). Another teacher, Mitchell (2000) supports this view, also emphasising the importance of the gamelan being a 'ready-made mixed-ability teaching tool' for which no specialism is required, and the value of equal importance of each player in the ensemble. The reasons for using gamelan in schools are summarised by Sarah Kerkus, then Head of Schools Programme at Sage Music Centre, Gateshead in an interview with Morrison (2007):

'Anybody can come to the gamelan, whatever their level of experience, and it is an inclusive instrument. You have got that instant success and you can move on quite quickly. You are also levelling the playing field because it is new to everybody and nobody knows what to expect. Even though it is lots of instruments coming together, it is still one instrument and you have to learn as one. It gives an orchestral experience that is not often available to a lot of children. It is a fantastic way to develop rhythmic ability, teamwork and self-confidence.' (Morrison, 2007).

This view summarises many of the key aspects of gamelan playing which teachers and gamelan tutors have cited as particularly relevant to this type of music. Whilst some schools have access to gamelan as stated earlier, many also used classroom percussion, usually Orff instruments. As Carl Orff based his Schulwerk instruments on gamelan instruments (Sorrell, 1990) this works well, although inevitably something is lost with the diatonic tuning. There have also been the creations of 'virtual gamelans' for studying the music in schools, such as The 'Virtual Javanese Gamelan' created by Wells Cathedral School and in France, the 'Gamelan Mecanique' created by the arts organisation 'Cite de la Musique' in Paris for its education programme.

3.6 Summary

This chapter has traced the beginnings of gamelan knowledge in the West and shown how its popularity and use developed through its influence on composers and composition, its use in Universities to teach ethnomusicology and its development in education as a way to learn about music of other cultures and develop musical and composition skills. It is evident from this look at the history that gamelan music has captured the imagination of many western musicians and educators; the appeal of this music may be relevant for its use in music therapy. From the reports of gamelan use in education, noted benefits of gamelan playing which could also have relevance for the research questions in this study include: it caters for mixed abilities; it can develop musical skills; it is unknown and levels the playing field, and it can develop teamwork and self-confidence.

In the next chapter I will trace the development of gamelan playing with children and adults with differing special needs, health issues and living situations.

Chapter 4. Gamelan with people who have special needs and with special populations

The majority of literature about the use of gamelan with children and adults with differing special needs is in the form of reports and gamelan magazine articles written by gamelan practitioners. There are also a small number of research studies. I will now present the outcomes of a review of this literature.

4.1 Physical Disabilities

One of the earliest accounts of the use of gamelan with people who have special needs is given by ethnomusicologists Sanger and Kippen (1987), in a paper entitled 'Applied Ethnomusicology: The Use of Balinese Gamelan in Recreational and Educational Music Therapy'. They report on an experiment to incorporate Balinese Gamelan within an integrated summer music course for physically handicapped and able-bodied people. Gamelan was taught using the traditional Balinese system of learning by rote and practicing as a group, with all lines together. This method, they found, required much more co-operation than participants had been used to and that maintaining eye-contact and listening carefully to each other were vital for members to integrate their parts with the music of the group. Thus social interaction was developed through musical interaction. Other reported outcomes of the experiment were that the gamelan catered for all levels of ability, both musically and in terms of playing techniques and therefore offered possibilities and challenges to people with a range of abilities and disabilities. Various adaptations for playing instruments, and simplifications of musical parts were made. As the music was learnt aurally there was no division between those with experience who could read notation and those who could not, and participants were not inhibited in learning or playing the gamelan as it was an unfamiliar musical tradition for them all. The authors concluded that the experiment had a successful outcome and suggest that 'a particular non-Western musical tradition [Balinese Gamelan] is eminently suitable for certain kinds of music-making, notably those designed to be therapeutic in the recreational and educational senses of the word.' (Sanger and Kippen, 1987, pp.14-15) They make the distinction between the way the gamelan was used for this project which was for 'recreational and educational music therapy' and the practice of clinical music therapy and conclude that the success of

the experiment 'suggests that a detailed investigation of the practical value of this work to the field of clinical music therapy would be well worthwhile.' (Sanger and Kippen, 1987, p.15)

4.2 Hearing Impairments

One of the pioneers of using gamelan with the hearing impaired is Russ Palmer, a music specialist who works with people with a sensory impairment, has visual and hearing impairments himself, and who has worked for the Royal Schools for the Deaf. In a report entitled 'Deaf Gamelan Workshops - a new approach to music' (Palmer 1991) he comments on how hearing impaired people appear to treat music as something only for hearing people. He discounts this idea, describing himself as someone who was born deaf and who gets a lot of pleasure from playing music. Palmer encourages hearing impaired people to play music including the gamelan, which he states 'has everything to offer from a deaf person's point of view, it is visual, vibrational, inspirational and good fun to play with.' (Palmer 1991). He also talks of how it can break down some of the barriers to participating in music that deaf people encounter.

Palmer also explored the effects of different gamelan instruments on the body to establish what kind of gamelan instruments would be most appropriate for people with sensory impairments. In a small experiment (Palmer, 1996) he played instruments in front of or over the body of a hearing and visually impaired subject, who then described where in her body she felt the vibrations and whether the tones she sensed were low, medium or high. Palmer also analysed the differences in listening with or without a hearing aid, where turning it on meant she used her residual hearing and turning it off meant using the body senses. The subject was able to feel tones of different instruments in different parts of her body. Some were more effective than others; low to middle range tones were felt on the body 'like church bells' and a small gong (kempul) was experienced as a sharp feeling in her lungs. Of particular effectiveness was the largest gong from which the vibrations were felt for a longer time, going 'up and down her body from her back and lower torso area to her feet'. When listening with hearing aids on she found the sounds too loud and had to adjust the volume control. From this acknowledged brief experiment, Palmer concludes that gamelan instruments 'offer deaf children an

opportunity to explore and visualise music much more than 'say' classical music'. (Palmer, 1996, p.3). The Royal Schools for the Deaf (RSD) went on to purchase its own gamelan which it housed in a separate gamelan room at its school in Manchester. Smith (1997) reports on a conference in which educational audiologist Peter Annear from the RSD described the advantages he sees gamelan as having over western percussion instruments for children with hearing impairments who frequently have additional disabilities. It provides, he says, a multi-sensory experience, and emphasises the importance of 'the amazing visual impact, the intricate tactile carvings with their woody smell, the quality and range of pitches and the unusual tunings.' (Smith, 1997, p.1).

Hawley (2003), musician in residence at the RSD draws several conclusions for why the gamelan is so valuable for these students; she emphasises the large sensory resource, the visual stimulation, the size and scale of the gongs, and the quality and resonances of the sounds produced. She notes that the music can be simplified without losing its connection to traditional music structures and that these can provide 'a clear framework for musical exchange and individual expression.' (Hawley, 2003, p.5). The gamelan continues to be used regularly with children and teenagers with a range of sensory impairments and profound and complex communication and learning disabilities at what is now known as the Royal School, Manchester.

4.3 Learning disabilities

There is relatively little written about using gamelan with children and adults who have learning disabilities, although it is reported in gamelan magazines and websites that this work is going on by various gamelan groups and tutors. Crawford (1995) describes weekly workshops using Balinese gamelan with adults who have mild learning disability. The group also involved ethnomusicology students and worked towards a recording and a performance. Crawford argues that gamelan playing offers much more than the playing of ordinary classroom percussion instruments does; whilst it can develop some of the same skills, such as coordination, concentration and listening, its potential is far greater than this. Gamelan playing, she proposes, emphasises group interaction and playing together, which are reinforced by the fact that the gamelan is 'a family of instruments which belong to each other, rather than a haphazard mixture.' She places importance on the aesthetic pleasure of playing the intricately carved, 'ethereal sounding' instruments, but unlike some tutors she also stresses the importance on its heritage, saying 'possibly the most important feature of the gamelan is the cultural background to which it belongs, and from which it ought not to be totally detached.' (Crawford, 1995, p.5). This, she suggests provides great opportunities for education, using costumes, puppets, dance and visual artefacts. The success of this work led the arts organisation involved, Open Arts, to purchase its own Javanese gamelan, described as a 'community music facility for disabled and integrated groups.' (Ingram, 1997, p.8). A 'travelling gamelan', it is taken around Northern Ireland for workshops and residencies in different venues for people with and without disabilities.

Ockelford (2008) proposes that gamelan is particularly suited for group musicmaking with children and young people with complex needs, who are attracted to the full textures and resonances of the music and able to actively participate with assistance. He suggests that group performance on the gamelan can be a satisfying form of musical self-expression for these young people, concluding 'It is difficult to imagine a more inclusive form of music-making.' (Ockelford, 2008, p. 128).

4.4 Research Studies

4.4.1 Learning disabilities

The main research into the use of gamelan workshops for people with learning disabilities has been conducted by MacDonald with various co-collaborators, (MacDonald, 1996; MacDonald, O'Donnell and Davies, 1999; O'Donnell et al 1999; MacDonald and Miell, 2000; MacDonald and Miell, 2002). In these studies the authors show that taking part in Gamelan workshops can improve musical and communication skills of people with learning disabilities, and develop joint attention (MacDonald and Miell, 2002). They conclude that there are many personal and social gains which can be made from participating in this music, which in part stem from the structure of gamelan musical form and how one has to work as a group within it.

The first of these joint studies, (MacDonald, O'Donnell and Davies 1999), investigated how structured music workshops for adults with learning disabilities using Javanese gamelan could facilitate developments in both musical and communication skills for the participants. Gamelan workshops over a period of 18 months were compared with a control group taking part in cooking workshops. Participants developed their basic musical skills and improved their performance on a range of communication skills. This latter result was not found in the cooking groups, and it was therefore clear that participating in musical interactions rather than just group activities was responsible for these wider improvements. Carers also noted that the participants were highly motivated to take part in the workshops because they enjoyed them so much.

In considering what is particular about gamelan workshops (as opposed to other musical activities) which produce this result, MacDonald and Miell (2000) identified several factors. The lack of a conductor, with all directions being given musically by the drummer required continuous listening for signals and tempo changes and group centred communication. The process of developing the music in the workshop emphasised 'non-verbal elements and transactive musical communication evident in the way the music is developed.' (MacDonald and Miell, 2000, p.63). For the music to develop cohesively, complex social skills were required; 'all participants must be monitoring each other's talk, actions and music and communicating effectively with each other through all these channels.' (MacDonald and Miell, 2000, p.63). The study showed that these skills were developed through the gamelan workshops and were generalised to other contexts. A related study to this which used video analysis of gamelan workshops showed that developments in communication skills could be linked to developments in joint attention (O'Donnell, MacDonald and Davies, 1999). The nature of gamelan playing was considered to be particularly relevant for the development of joint attention as it required both musical and social cooperation and involved 'the combination of listening to instructions, paying attention to other people's performance and appropriately executing one's own.' (O'Donnell, MacDonald and Davies, 1999, p.225). As joint attention has been found to be disrupted in children of non-typical development, such as children with Down's syndrome, playing gamelan, MacDonald and Miell (2002) suggest, could help develop their joint attention skills. MacDonald and Miell (2000) also point to the importance of the

gamelan's accessibility for people with special needs, noting that it is physically simple to play, and can be approached without preconceived cultural ideas due to being largely unknown in western cultures.

4.4.2 Autism

Research into a medical ethnomusicology programme for children on the autistic spectrum has been conducted by Bakan and colleagues (Bakan et al, 2008). In a programme of 'Music-Play Projects', groups of three children, their parents and two ethnomusicologists take part in child-centred play in a specifically designed 'Exploratory World Music Playground'. The majority of the instruments used come from Balinese and Sundanese gamelan, with the addition of some other ethnic instruments and small percussion. The research study focused on one child and concluded that through the positive experience of engaging in social musical play in this 'World Music Playground' he became more motivated to play with others and to see the potential for increasing his happiness through this. Although gamelan instruments are used in the project, the facilitators do not appear to use any gamelan music or musical structures. The criteria used to select these instruments were that they produce satisfying sounds with small amounts of effort and almost no technical ability.

4.4.3 Attention Deficit Hyperactivity Disorder (ADHD)

A research project at the Temporal Dynamics of Learning Centre (2013), is currently investigating whether playing Balinese gamelan can help children with attention disorders. A pilot project demonstrated that group gamelan playing increased children's ability to synchronise musically and improved their overall attention. This link, the researchers suggest, could be used to help children who have ADHD, to improve their sense of timing and manage their behaviour (O'Brien, 2013).

4.4.4 Prisons and Young Offender Institutions

A recently established and expanding area of gamelan use is within the penal system and other secure settings. The 'Good Vibrations Gamelan in Prisons' project was set up initially to run week long gamelan residencies in prisons and young offender institutions and has since broadened its scope. The aims of the project are: 'to help prisoners, patients in secure hospitals and offenders in the community develop team-working, communications and other important life skills, through participating in gamelan (Indonesian percussion) workshops.' (www.goodvibrations.org.uk). Groups of prisoners attend a week long workshop, facilitated by external gamelan tutors. They learn traditional pieces, improvise and compose their own music. The week culminates in a performance and a CD is produced, each participant receiving their own copy.

An ethnographic study of the Good Vibrations project (Wilson and Logan, 2006) looked at prisoners' views of the benefits they gained from taking part in the gamelan workshops. Results demonstrated that prisoners found it beneficial as a way of getting to know and work with others, to feel part of something, to distract themselves and be soothed by the music, and to help them gain confidence. The accessibility of the gamelan was considered to be important to its success, the majority of prisoners taking part having never played a musical instrument before. The study found that prisoners were very quickly able to make music which sounded competent, skillful and in tune with each other. The 'alien' nature of the music, they suggest, rather than putting participants off, was a strength because it served to make everyone equal. The study also found that half of all those who attended Good Vibrations projects went on to enroll for formal education courses in the prison and thus achieved one of the project's aims; to help prisoners access education programmes.

The effects of a gamelan residency were included in a research project which studied women prisoners who self-harm, in a single prison (Digard, von Sponeck and Liebling, 2007). The researchers, who were criminologists, conducted interviews and administered questionnaires for participants before and after a week-long gamelan playing course aimed at self-harming women. They propose that discussing the meaning of the music being made in a workshop presented an opportunity for the participants to reflect upon their lives 'without the potentially intimidating context of formal 'therapy'. The group leaders also encouraged reflection on group processes involved in improvisation which participants related to their personalities. Some participants let themselves be more vulnerable to their peers and the researchers suggest that this experience could work well in preparing individuals for group therapy. The researchers conclude from this experience that 'the therapeutic potential for prison-based music programmes, such as gamelan, seemed great.' (Digard, von Sponeck and Liebling, 2007, p.12).

Mendonca (2010) emphasises the 'socially transformative nature' of the Good Vibrations projects, both on individuals and on aspects of the institution. She points out that whilst some of the beneficial aspects are unique to the gamelan, others could be replicated in other music projects (Mendonca, 2010, p.303).

4.4.5 Physiological effects

A research project undertaken by an Indonesian psychologist in Java, (Natalia 2002) looked at the effect of playing Javanese gamelan to new-borns. Results showed there were no significant differences in the heart and respiration rates and the crying patterns of the new-borns who had experienced gamelan music, however, there were significant differences in weight and sleep patterns. The experimental group slept more soundly and gained more weight than the control group. Subjectively, the mothers, nurses and doctors and researcher felt that the emotions of the experimental group were calmer than the control group. The significance of the music being gamelan rather than any other genre is not clarified in the study. It could be speculated that there was a familiarity with this music, but equally the study may have achieved the same results with another type of music, in comparison to no music. Natalia does however make some suggestions about the types of gamelan music and instruments that should be played, referring to 'feeling parts' in gamelan which could be further explored.

Gamelan listening was also shown to reduce anxiety and physiological responses in patients with ventilator support in Indonesia, where familiarity with the music was thought to be a positive factor (Suhartini, 2010).

4.5 Gamelan in music therapy

There is very little evidence in the literature of gamelan being used by music therapists in their practice. The main reference to it is made by a Dutch music therapist van Bruggen-Rufi (2007, 2011). A research project conducted by van Bruggen-Rufi (2007) examined the effectiveness of 'Individualised, Culture-centred music therapy' to reduce behavioural problems in elderly people from the former Dutch colony of the Dutch East Indies (Indonesia) who had mild dementia. These clients were mixed race Dutch-Indonesian people who immigrated to the Netherlands after the second world war. Of Dutch and Indonesian extraction herself, van Bruggen-Rufi uses gamelan and other popular Indonesian musical styles in her work with these clients, music which the clients are familiar with from their earlier lives. The results of the small pilot project undertaken did not show any significant effect from analysis of behavioural observation questionnaires, however, feedback from clients, nursing staff and relatives considered that it had had a positive effect on behaviour. A further description of this 'Culturally Centred Music Therapy' is given by van Bruggen-Rufi in a detailed case study (van Bruggen-Rufi and Vink, 2011).

Interest in the use of gamelan in music therapy is beginning to be shown by gamelan-playing music therapy students (Rigney, 2006; Parolisi, 2008) in response to an essay by the author (Loth, 2006) and by Pun (2011), who conducted a philosophical study during her music therapy training into the connections between Balinese music and culture, and the possibilities for its use in music therapy.

4.6 Gamelan and traditional healing practices

An area beyond the scope of this study is the role of gamelan music in healing practices in Indonesia. There are some healing practices involving music and dance in Bali, such as trance dances and in temple festivals, where the 'Balian ketaksan', a traditional healer acts as a shaman and conducts a healing ceremony. In a less typical application, Akombo (2006) describes a project conducted within a Balinese psychiatric hospital where these healing aspects of music and dance were utilised. In this project, patients were brought to a community stage daily to play gamelan and dance, under the guidance of staff. Music was selected by healers to match the mental state and mood of the patients. The psychiatrist observed that patients may ask to play the gamelan because they believe that their healing process is connected to the ensemble. As Stige (2008) notes, this example shows a modern institution appropriating traditional rituals in new ways.

Moreno (1988, 1995) argues that music therapists should pay more attention to traditional healing practices. He suggests that therapists look at the music used in music healing rituals and shamanic practices, isolate these elements and use them in (western) music therapy. He proposes a new and integrated discipline to be called 'ethnomusic therapy' which he defines as 'the multi-disciplinary study of indigenous music and healing practices with a patient-centered focus.' (Moreno, 1995, p.336). Chase (2003) concurs with Moreno's view that music therapists would benefit from exploring the music and instruments of different cultures, whilst noting that care should be taken with music that can have specific meanings in traditional healing practices which may not be appropriate in the music therapy setting. In this study I have chosen to focus on how gamelan is used therapeutically in western cultures. However, a further area to consider in the future would be whether elements of gamelan music as used in traditional healing practices have relevance to western music therapy practice.

4.7 Other experimental uses of gamelan

McIntosh (2012) reports on a project which used the learning of Balinese gamelan for a professional development course for Adult Literacy tutors. Through playing gamelan, tutors were able to gain insight into their own learning processes, reflect on the experience of their adult literacy students, and look at how they could approach issues differently.

In a similar context, a gamelan project was incorporated within a post-qualifying award to develop leadership and management skills for social work and nursing practitioners (Leonard, Hafford-Letchfield and Couchman, 2013). The experience of learning a complex piece of gamelan music together with practitioners, service users and academics was found to have benefit as a creative and innovative learning experience within which participants could experiment with taking on different roles related to power and leadership, develop insight and self-confidence. The authors suggest that creative practices such as gamelan playing could be incorporated into health and social care curricula to 'develop purposeful reflection, team working and participatory leadership for students and service users.' (Leonard, Hafford-Letchfield and Couchman, 2013, p.188).

4.8 Summary

This chapter has provided an overview of the development of gamelan playing with children and adults outside mainstream education and community settings, with those who have specific needs, disabilities or health issues, and with special populations. It has presented research into the use of gamelan for a range of purposes and shown how some of its particular qualities have been identified.

Reviewing the literature in relation to the research questions, specifically the therapeutic aspects of gamelan playing with people who have special needs, there are several aspects and research outcomes which could have relevance to its potential use in music therapy practice; it can improve communication skills by emphasising group-based communication; it requires complex social and listening skills to play without a conductor; it does not require particular skills to begin playing and produce satisfying sounds; its unknown nature allows people to approach it equally; it can help with physical coordination and the music can have a relaxing effect on listeners and players.

I will now move on to the main research aspects of this study, beginning with a consideration of the methodological issues involved.

Chapter 5. Methodological Overview

In this chapter I will outline the methodological approach which underlies the study and the procedures chosen for data collection and analysis. I will describe two of the main paradigms for research, and justify my choice of a naturalistic approach. I will then outline the reasoning behind my choice of a qualitative method and consider some of the other methods available. Brief descriptions of the research stages follow, ending with consideration of reflexivity and ethics.

5.1 Positivism and Naturalism

There are a number of paradigms upon which research can be based. One approach is to delineate the possibilities into two categories; positivism and naturalism, sometimes known as constructivism (Lincoln and Guba, 1985). Positivism is a theoretical approach which 'suggests that there is a straightforward relationship between the world (objects, events phenomena) and our perception, and understanding of it.' (Willig, 2001). It is based on a belief that there is a truth to be found, and that research can uncover objective knowledge which is unbiased and not influenced by the researcher. Most research undertaken within a positivistic paradigm is quantitative research (Wheeler, 2005, p.13). Quantitative research uses empirical methods to test hypotheses, and scientific attitudes to measure observable behaviours, based on a belief of cause and effect. Through the control of all other influences than that being studied, a truth can be found which can be replicated by repeating the study.

Research conducted within a naturalistic paradigm does not begin with a hypothesis; it is more explorative and gathers data from natural settings using qualitative research methods such as observation or interviews, and asks questions about the data. In contrast to positivism, the naturalistic paradigm does not support the view that there is a single reality to be found, but that 'there are multiple constructed realities that can be studied only holistically' (Lincoln and Guba, 1985, p.37).

In a naturalistic enquiry the research takes place within 'natural or real-world settings' (Wheeler and Kenny, 2005, p.64) and the researcher does not try to influence or change the events or phenomena being studied.

5.1.1 Choice of approach

The main research question of this study, 'What does the playing of gamelan music have to offer the practice of music therapy?' is an open question to which there is unlikely to be a single answer; this suggests that an explorative stance and research methods are required to answer it. There is no absolute truth to be uncovered, no hypothesis or specific techniques which are to be tested out; therefore a positivist approach is not indicated. The premise of the research is that by studying gamelan musical practice in a range of settings to identify any aspects which could be therapeutic, and combining this with my knowledge of music therapy, I will be able to demonstrate the relevance of gamelan music to music therapy practice, the title of the study. The study of gamelan music as it is played in its natural setting and in current western practice is looking at real-world situations, which are not being put under any sort of control conditions. Therefore a naturalistic paradigm is indicated, using qualitative research methods.

5.1.2 Qualitative Research

Strauss and Corbin (1998) describe qualitative research as 'any type of research that produces findings not arrived at by statistical procedures or other means of quantification.' (Strauss and Corbin, 1998, pp.10-11). Whilst quantitative methods might be applied to some elements of the data, the majority of it will be analysed from an interpretive stance. The choice of qualitative methods, they emphasise, should be made according to the nature of the research question being asked. There are several parts to this study which use characteristics of naturalistic enquiry, as defined by Lincoln and Guba, (1985); it uses qualitative methods, has an emergent design, that is, the research design has unfolded through 'the interaction between inquirer and phenomena' as all elements could not be known beforehand, it uses purposive sampling to ensure the scope and range of data found is maximised, and has an inductive rather than reductive approach to the data analysis as this is 'more likely to identify the multiple realities to be found in those data.' (Lincoln and Guba, 1985, p.40)

5.2 Context within music therapy research field

Research in music therapy has developed and grown over the years, reflecting the range and changing nature of music therapy practices (Wigram, Pedersen and Bonde, 2002; Wheeler, 2005). Because of the need to show the efficacy and costeffectiveness of music therapy early research tended to be outcome-based using traditional quantitative and experimental methods (Rogers, 1995). As the use of qualitative methods of research grew in areas such as the human sciences and the arts during the 1980s, music therapists also began using some of these to study music therapy practice (Wheeler, 2005). There is now a great diversity of approaches to research within the music therapy field; the most recent edition of Wheeler's comprehensive edited volume on the subject includes over twenty chapters detailing different methodologies used in music therapy research. The distribution of chapters shows that the greater proportion of these is within the naturalistic paradigm, with twelve chapters describing types of qualitative research used against five describing quantitative research methods. Other types of research found are those researching music, philosophical inquiry, developing theory and historical research in music therapy (Wheeler, 2005).

The focus of research is also wide-ranging, covering both the processes and the outcomes of music therapy. Process topics include studies concerning the nature of the client-therapist relationship, clients' and therapists' experience of therapy, how it works, and questions to do with the quality of the music and how it changes within the therapeutic process. Outcome studies have used either physical forms of measurement, such as changes in physiological responses including heart-beat and respiration, changes in physical state or factors such as pain perception (Wigram, Pedersen and Bonde, 2002).

In response to the development of evidence-based practice as the gold standard for treatment choice in health practices, the need for rigorous research evidence which can 'prove' the efficacy of music therapy has been highlighted. Quantitative research methods such as randomised control trials (RCTs) are being increasingly used for this purpose (Wigram, Pederson and Bonde, 2002; McKinney, 2005). This study does not directly investigate a music therapy practice, rather it considers a gamelan music practice which has some similarities to music therapy and seeks out the therapeutic aspects of it. In common with music therapy, the participants of this gamelan practice have differing special needs, and extramusical and therapeutic benefits are reported for it. Whilst the study does not primarily focus on process and outcome in music therapy as described in the music therapy research literature, it does look at therapeutic processes and contributory factors and considers their relevance and potential application to music therapy practice. Therefore I consider it appropriate to situate the study within the approaches and practices of music therapy research, whilst also employing methods used in music psychology research.

I will now describe the research methods employed for the different stages of the study in more detail.

5.3 Setting the scene

5.3.1 Gamelan in Indonesia

In order to consider the relevance of gamelan to music therapy it was necessary first to explore the nature of gamelan music and how it is played in its natural occurring setting, that is, in Indonesia. This was undertaken through a review of literature which described this musical practice, its culture and meanings in context. It was looked at critically in relation to the main research question, and identified several features which could be relevant to the study.

5.3.2 Gamelan and special needs

In order to address the first sub-question, 'What are the therapeutic benefits of gamelan playing for people who have special needs?' it was necessary first to review all literature, tutor reports and research studies which described the use of gamelan with people with any sort of special needs. This literature review (Chapter 4) identified several features which could be relevant to the therapeutic use of gamelan. It also showed that gamelan is being used in a range of ways with several different client groups, but that the reports of the work are patchy and there is a lack of systematic enquiry into the reasons why it is being used and what aspects of gamelan playing are particularly useful or effective with different client groups or participants. Therefore the views and experiences of the tutors undertaking this work were sought to explore in more depth the nature of the work they were doing, how and why they were using gamelan and their views on its specific qualities and effectiveness as a musical practice for special needs groups.

5.4 Identifying the participants

Before being able to engage with gamelan tutors, it was necessary to first find out who was doing this work, where and with whom. To answer this question I undertook a mapping exercise to locate all the gamelan and gamelan tutors in the UK, and the range and extent that gamelan is used with people with special needs. Gamelan coordinators and tutors identified were sent an email containing a short series of questions asking for details of any special needs work being undertaken and the types of gamelan being used. The results were collated to give an overview of the range of people being worked with, the tutors involved, and the types of the gamelan playing activities, instruments and settings being used. Full details of the method and results are given in chapter six.

5.5 Choice of research methods

In order to examine in depth the work of gamelan tutors with people with special needs various methods were considered. Observational methods of investigating gamelan sessions would give me a first-hand experience of and information about the work; video recording would provide real-life data to analyse. Various techniques of microanalysis (Wosch and Wigram, 2007) could be used to identify what I as researcher saw as therapeutic aspects of the work. However, this would not capture information from the tutors about how they viewed the nature of their work, what they did and why. One option to address this would be to discuss the observed work with them following sessions. Whilst this would provide more data about the observed session, it would only be a snapshot of their work, and may not elicit information on any other special needs work they had undertaken in the past and what they had learnt from their experiences with different groups of people. Further, the answers to the mapping email suggested that not all the special needs

work described was current, nor was it a regular event; several tutors mentioned work carried out in the past, and others described the work as being irregular oneoff sessions. Therefore it was likely that using observation and video-recording as the main data collection method would not encompass the full range of special needs work identified through the mapping exercise. A further practical consideration was the amount of time it would take to wait for relevant special needs work to happen, which could have been several months apart. Therefore I decided to gather information directly from the tutors themselves through interviews.

5.5.1 Semi-structured interviews

To gather as much rich data from the tutors, the method of semi-structured interviews was chosen. The alternative method of a detailed questionnaire was also considered. It would have been difficult to design enough appropriate questions for this; I was not yet aware of the reasons why people were using gamelan, or even if they did consider it to be particularly effective with special needs groups. At this stage of the research the need was to elucidate the reasons people were using gamelan and the ways they thought it worked as a suitable musical experience for people who have some sort of difficulties or challenges, some of which they may not have yet articulated for themselves. This would require a discussion to draw out more thoughts and information, to prompt tutors to follow through their initial ideas and develop them. For these reasons a questionnaire method was rejected as too reductive and unlikely to elicit the depth and subtleties of people's thoughts and reasons for using the gamelan. As is the case with an emergent design, the research method was chosen as the requirements became apparent. The approach to interviews conducted within the naturalistic paradigm, which are carried out in as natural a way as possible to 'capture the normally occurring thoughts, feelings and interactions of the participants' (Wheeler and Kenny, 2005 p.64) was chosen as most useful for the study.

The mapping exercise generated information that allowed a purposive sample of gamelan tutors to be chosen. This sample represented all the areas identified in the mapping responses: client groups, settings, types of work and instruments. Nine tutors were selected to interview. A full description of the method used for the semi-structured interviews is given in chapter seven. Question areas or topics were developed from the analysis of the literature review and the replies of the mapping exercise. A pilot interview was undertaken and the questions areas and subquestions or prompts revised. Interviews were then carried out over a period of five months and were recorded and transcribed verbatim by the researcher.

5.5.2 Data analysis

The method of data analysis chosen for the interviews was Thematic Analysis, as defined by Braun and Clarke (2006). Thematic analysis is a procedure that can be applied 'across a range of theoretical and epistemological approaches' (Braun and Clarke, 2006, p.78) and is incorporated in several research methodologies, such as Grounded Theory and Interpretive Phenomenological Analysis. It can be defined as 'a method for identifying, analysing and reporting patterns (themes) within data.' (Braun and Clarke, 2006, p.79). They propose that thematic analysis should be seen as a research method in its own right, rather than just a process incorporated within other theoretical methods. Through not being bound to a specific theoretical framework, its flexibility means that it can yield 'a rich and detailed, yet complex, account of the data.' (Braun and Clarke, 2006, p.78). As this study is not theory driven, it is seeking to find meaning from the data that can be interpreted to answer the question of what can be therapeutic about gamelan playing; thematic analysis is an appropriate method to use.

Through the coding of the data and the distilling of these into themes, the therapeutic elements of gamelan playing and the complexity of the factors involved in this can be identified.

From the thematic analysis of the semi-structured interviews three sets of themes were identified: Procedural Themes, which related to the practical factors involved in playing, the who, where, what with and how elements; Tutor Themes, which related to the experience and training of tutors and the aims of their work, and six Key Themes, which form the body of the analysis, focussing on the research question of what could be therapeutic about gamelan playing with people who have special needs. These themes were then discussed in relation to music therapy practice, to consider the relevance of these benefits to therapy. This is described in detail in chapter 7.

5.6 Other qualitative methods considered

Two methods which use thematic analysis in the early stages of the process are Grounded Theory and Interpretative Phenomenological Analysis (IPA).

5.6.1 Grounded Theory

Grounded theory was developed by Glaser and Strauss in 1967 and has seen many developments since then and the creation of several different versions. It is a method which seeks to develop theory from the data collected and analysed to explain the phenomena being investigated. It involves strategies of 'constant comparative analysis, theoretical sampling and theoretical coding.' (Willig, 2001). In contrast to some other methods it does not involve a series of sequential steps leading to an answer to the research question, it requires a continuous moving between the data and the analysis and back again. Data is coded and linked, but then the researcher returns to collect more data; through this process, theory is built which is grounded in the data. Grounded theory has been used in music therapy research, mainly in modified form or using the data analysis method (Amir, 2005). This method does not meet the purpose of this study, which is not to find a theory to explain the relevance of gamelan to music therapy practice, but to explore what relevance there may be, and what the elements are which make it potentially useful for therapy.

5.6.2 Interpretative Phenomenological Analysis

This qualitative research approach, rooted in psychology, examines how people understand and make sense of their life experiences (Smith, Flowers and Larkin, 2009). It is informed by phenomenology, a philosophical approach which looks at how people learn about the world around them and create meaning from their own individual experiences. It is concerned about the world 'as it is experienced by human beings within particular contexts and at particular times' (Willig, 2001, p.51). It most commonly uses semi-structured interviews for data collection but may also incorporate participants' diaries or other writing. Interviews are transcribed and analysed using a qualitative analysis, such as thematic analysis. A key aim of IPA is the understanding of the lived experience of the participant in relation to phenomena. This study, whilst being interested in this is more concerned with how this informs the what, how and why of the phenomena; gamelan playing with people who have special needs. It seeks to draw not only from how participants *experience* using gamelan with people who have special needs, but also from descriptions of what they do, the methods they have developed and their opinions and views based on their professional experience of the work in order to answer the research questions. For this reason, IPA was not considered to be the appropriate research method for the study.

5.7 Further exploration of generated themes

The second sub-question of this study; how can these benefits be used by a music therapist in clinical work, was considered in this interpretation of the outcomes of the data analysis and suggestions were made for their potential use. The purpose of this was to generate a set of principles or guidelines for using gamelan in music therapy practice. Whilst data collection could have ended at this stage, and a synthesis of all the data made to generate these principles, I was interested in exploring the interview themes further. I considered that by taking some of the themes generated from looking at the work of gamelan tutors into clinical music therapy practice, I would provide a further layer of detail to the thematic analysis. This would generate more information to take into the overall data synthesis and would provide more detail to be used in the development of guidelines for gamelan use in music therapy practice. In this part of the study, I moved into the role of practitioner-researcher and investigated by own practice of using gamelan in music therapy through the setting up and running of a series of music therapy sessions which used gamelan instruments, referred to as the School Project. Having completed the project, I used the clinical data produced as a researcher to evaluate the original themes and their relevance to music therapy practice.

5.7.1 School project

A short-term music therapy group of children with developmental disorders within a special school was selected as one possible application of gamelan in music therapy. This client group and setting is a well-established area of music therapy practice. A block of eight music therapy sessions using instruments from a Balinese Gamelan Angklung was conducted by the researcher; this was written up as a case study and evaluated using the six key themes from the interview analysis to explore their effectiveness in the case work. This part of the study is detailed in chapter eight. The results of this were taken into the last stage of the study, the synthesis of all stages of the data.

5.8 Outcomes

In the final part of the study an overall synthesis of all the data was undertaken, revisiting the analysis of the literature, mapping exercise, semi-structured interviews and school project to propose some principles and guidelines for the use of gamelan in music therapy practice. Possible applications and settings for practice were considered.

5.9 Reflexivity/ Stance of the researcher

It is important in qualitative research to acknowledge and maintain awareness of the researcher's own position in relation to the phenomena being studied and the impact of self on the research. This relationship is one of the key features of naturalistic research that differentiates it from positivist, that 'the inquirer and the "object" of inquiry interact to influence one another; knower and known are inseparable.' (Lincoln and Guba, 1985 p.37). Denscombe (2007) proposes there are two ways that the researcher can deal with the involvement of self in qualitative research; by controlling their own values, beliefs and attitudes so that they remain detached from the production and analysis of data, or by acknowledging their involvement and 'the way their research agenda has been shaped by personal experiences and social backgrounds' (Denscombe, 2007, p.301). The position can then be taken that this involvement is actually a resource for the research rather than a limitation, and can be used to gain 'privileged insight' into the topic. As both a gamelan player and a music therapist I have experience and opinions about both practices. I have striven to maintain a position between the two extremes described by Denscombe (2007) by acknowledging my involvement in both at all stages of the research, and considering reflexively whether these are informing or affecting decisions made in the research process and data analysis. By keeping the research questions in mind throughout the study and focussing only on the data relevant to

this, I have sought to minimise researcher bias and subjectivity. However, I recognise that the phenomena and experiences I have investigated are, as Wheeler and Kenny emphasise, 'seen through the researcher's eyes and heard through the researcher's ears and thus that they are shared through the researcher's voice' (Wheeler and Kenny, 2005. p.67). Therefore it cannot be claimed that the study is entirely objective.

5.10 Ethics procedures

Ethical approval for the study was sought from Anglia Ruskin University using the Research Ethics Guidelines. It was applied for in two stages, the first being ethical approval for the overall study and for the interview procedures. This was obtained before commencing the study. The second part of the ethics application concerned the clinical project. As in this emergent design the participants for this aspect would not be known until the preceding parts of the study were completed, ethical approval for the clinical project was applied for once the participants had been chosen. This was granted before the clinical work commenced. The full Ethics application form is shown in appendix B.

5.11 Summary chapter five

This chapter has outlined the research design of the study, discussed the research paradigms and methodologies common in music therapy research and made the case for the methods chosen. I have first presented two paradigms for research; positivism and naturalism and shown why the latter is most relevant to the study, as a naturalistic enquiry into the practice of gamelan with special needs group. The music therapy research field is discussed and the study situated within this. Qualitative methods are compared and the methods chosen for data collection and analysis; a mapping exercise, purposive sampling, semi-structured interviews, and the use of the Thematic Analysis method of Braun and Clarke (2006) to interrogate the data are all presented and justified. I have demonstrated how the study has an emergent design, from the themes identified in the literature informing the selection of participants and the question areas of the semi-structured interviews, to the development of a clinical project for further exploring the applications of generated themes for music therapy practice. Finally I have considered the issues of reflexivity and ethics. In the following three chapters I will set out each stage of the investigation, detailing the research methods used, the procedures and results. This begins with a description of the mapping exercise undertaken to establish the range of gamelan work with participants who have special needs and the identities of the tutors engaged in the work.

Chapter 6. Mapping Exercise

In order to find out what work is being undertaken using gamelan with people who have special needs it is first necessary to obtain an overall picture of gamelan use in the UK; how many sets there are, what settings they are based in, what types of instruments they are, who teaches them and how they are used. Therefore a mapping exercise was undertaken to gather this information. The second purpose of this mapping exercise was to obtain a list of gamelan tutors who could then be contacted to question further on whether they worked with any special needs groups.

The focus of this exercise was to uncover the range of gamelan practice, rather than the geographical distribution of gamelan across the UK. By identifying as many gamelan sets and corresponding tutors as possible, and using this information to send email enquiries, a broad picture of current practice would be gained; this would provide rich detail from which to choose a representative sample of tutors for further investigation. Rather than being interested in where gamelan was most popular, I was looking for all examples of practice with special needs groups and populations, to build up a picture of the diversity of practice.

6.1 Method

A range of sources was used to find gamelan sets and tutors. These included UK gamelan websites which list some sets of instruments and gamelan tutors (<u>www.gamelan.org.uk</u>, <u>www.gamelannetwork.co.uk</u>), and the gamelan data-base of the Gamelan Advisor from the Southbank Centre, an arts centre in London which runs a gamelan education programme and which had recently organised a gamelan festival involving many UK gamelan groups. In addition I used my own gamelan contacts gained from many years of playing in different groups and locations. After cross-referencing details, I compiled a list of all the locations of gamelan sets and, where available, contact details for each. The type of location addresses for these gamelan was varied: named gamelan groups, community organisations, music services, schools, orchestras, and several where the address was not clear. I located over 70 gamelan sets in the UK at this time, not all of which had a contact name.

67

In addition, I also identified several gamelan tutors not associated with specific gamelan. All these names and contacts were used in the next stage of the mapping exercise.

6.2 Mapping email

A short email enquiry was devised to find out who was working with special needs groups and what they did. It was sent to the identified tutors or contacts, who were asked to pass it on if they were not the appropriate person to answer the questions. The text introduced this part of the overall research study and asked for the basic details of any work the tutor was doing. The aim was to make the e mail short and easy to answer, by having numbered questions which tutors could use in their replies or inset their replies into. It was not intended to be a full questionnaire, as it was considered that gamelan tutors are frequently busy and would be less likely to answer this. The aim at this stage was to get as large a response as possible. An open question inviting any comments about the work was added to the list of factual questions to give respondents the opportunity to add any extra information they wished to, and to begin to gather information about the perceived effectiveness of gamelan playing with special needs groups, one of the main themes of this study. It also had the potential to sign-post tutors who were enthusiastic about the topic, and therefore may be useful to interview. The pilot e mail was first sent to an experienced gamelan tutor to complete and comment on. Following this the wording was further refined.

Mapping e mail text

Dear Gamelan Colleague,

I am undertaking a study into the use of gamelan with children and adults who have special needs in the UK. Many gamelan tutors work in this area and one aim of this investigation is to give us more information on effective ways to use gamelan with different groups and how it can be helpful. Special needs groups could include children and adults with learning disabilities, mental health problems, the hearing impaired etc, as well as special populations, such as those living in prisons or other institutions. The study is being conducted through Anglia Ruskin University, Cambridge, UK.

I am currently mapping out the range and extent that gamelan is used with people with special needs and would very much like to hear from gamelan tutors who are working with such groups or who have done so in the past. Please could you let me know if you or your organisation has been involved in this work? If you have time, it would be very helpful if you could include as much of the following information as possible:

- 1) The special needs groups you have worked with (inc. age range)
- 2) The settings this work takes place in
- 3) How long you have done this work
- 4) The type(s) of gamelan you use
- 5) The type of work this is, e.g. one-off workshops, weekly classes
- 6) Any additional thoughts you have on this work and its effectiveness

It would also be helpful if you could pass this request on to anyone else you know working in this area, or give me their contact details.

I am very grateful for your participation in this study. Please do contact me if you would like further information.

With best wishes,

Helen Loth

The mapping exercise was conducted for five months. About 50 tutors or designated contacts for gamelan groups were initially emailed; if the contact for the gamelan was the same as a tutor already identified, they were not contacted twice. Some contacts replied that they were only an administrator or other person related to the gamelan, not the tutor. They gave me a name of a tutor who was usually one of the tutors on my list. Thus it became apparent that although there are many sets of instruments in the UK, they are taught on by a much smaller set of tutors. These tutors teach on several gamelans each and for several organisations. In a few cases, the same gamelan turned out to be listed for several organisations. There was also a process of address correction and some contacts did not reply at all. These were sent a second email after 3 months and if they did not reply to this, were not contacted again. Some gamelan tutors also suggested additional names which added to the list of tutors. A total of twenty-five replies were received from gamelan tutors who were either currently working with people who have special needs, or who had done so in the recent past.

At the same time as the original mapping email was sent, I also sent a briefer version to the gamelan discussion list, 'Indonesian Performing Arts' at Dartmouth University, USA. This is an international open discussion list of people who are interested in gamelan (http://listserv.dartmouth.edu/archives/GAMELAN.html). It includes people who teach gamelan both in the UK and abroad. The purpose of this was two-fold: firstly to 'catch' any UK gamelan tutors who were not on my database but who were subscribed to the Dartmouth list, and secondly, to get an idea of the scope of this sort of work of gamelan and special needs that is going on internationally. The four responses received to this add to the context of the study and gave some useful references for the literature review. Two of the international respondents were Indonesian tutors. One wrote of the work he did when in the UK.

6.3 Mapping results

Of the twenty-five tutors who replied saying that they had done some work with special needs groups, ten said that this was very minimal or a long time ago and did not feel able to answer all the questions. Fifteen tutors completed the questions in the mapping e mail. The replies for each question were collated using spread sheets and the information from these is summarised below. The column numbers refer to the number of times this category was reported. Several tutors work with a range of different client groups, settings and workshop frequencies, therefore the numbers for each category do not total fifteen.

Figure 2 Results of Mapping Exercise

	Chi	ld /	Adult
Learning disabilities	10	8	3
Autism	5		1
Physical disability	2		3
Visually impaired	3		
Hearing impaired	6		2
Acquired Brain Injury (young adult)			2
Mental Health		4	1
Elderly			2
Prisoners		4	1
Young offenders	5		
Forensic psychiatry			2
Emotionally and behaviourally disturbed	1		
to	otal 32		28

Question 1: Participants worked with:

Questions 2: Settings

Schools	Adult Resource Centre
Music Centre	Museum
Gamelan room (unspecified)	Psychiatric hospital
Prison	Orchestral Centre
Probation Hostel	Music conservatoire
Young Offenders Institute	Arts Centre
Concert Hall Centre	Education - music service

Question 3: Length of time doing this work

1-2 years	1
3-4 years	1
5-6 years	4
7-8 years	1
9-10 years	4
11-12 years	0
13-14 years	0
15+ years	1
'in the past'	1
'several'	1

Question 4: Type of gamelan

Central Javanese	13
Sundanese degung (West Javanese)	3
Balinese angklung	2
Balinese semara dana	3

Question 5: Type of work

one-off workshops	12
monthly class	1
weekly class	4
short-term weekly block	2
long-term project	1
residency - 1 or 2 weeks	6
Summer school	1
Projects of variable frequency	1

Question six: Additional thoughts on work and effectiveness

Summary of points mentioned: (Not all tutors answered this question)

- Physicality of gamelan in space and sensation of sound through floor/air, draws people in who would otherwise not engage
- Physicality of students' responses
- Importance of the shared interaction
- Sounds: tranquil relaxing
- Sounds: overwhelming for child "my head's itching"
- · Gamelan used as instrumental resource; traditional and adaptations
 - Gongs very effective: -daily gong baths,
 - -swinging inside a gong

-'being stroked in sound'

- Seen as something 'exotic and easy' gamelan for special needs as 'can't do other things' (negative)
- encourages listening, communication, group team-working and co-operation and selfconfidence

6.4 Discussion of results

The range of special needs and special populations tutors were working with was quite diverse with twelve participant categories identified. Children and adults were worked with fairly equally. If similar categories are amalgamated, seven overall categories can be seen.

Learning disabilities	25
Adult and youth offenders/prisoners	9
Hearing impairment	8
Adult mental health	8
Physical disabilities	5
Visual impairment	3
Acquired Brain Injury	2

The group worked with by the most tutors were children and adults with learning disabilities, followed by adults with mental health difficulties (including those in forensic settings) and children and adults with hearing impairments. Children and adults with physical disabilities, visual impairments or acquired brain injuries were cited by the least number of tutors.

The range of settings for the work is also diverse, with tutors mentioning several different locations. As these are self-described categories, it is difficult to be completely clear where they are all located; however, the range includes music and arts settings, such as concert and orchestral centres, schools and education services, offender settings and mental health/learning disabilities settings.

The majority of the tutors have worked in this area between five and ten years, suggesting that they have considerable experience which can be drawn on for the study. Most work takes place using Javanese gamelan with only five tutors having used Balinese gamelan sets. This reflects the overall distribution of gamelan in the UK, where the majority found are Javanese. Of the list collated for this exercise, 61 sets were identified as Javanese, 13 as Balinese, one was home-made and three were unspecified. The majority of the work undertaken is one-off workshops, followed by week-long blocks or residencies. Four tutors ran a weekly class, although it is unclear over what period these lasted.

A range of interesting responses to questions six were given, with some tutors writing more than others and some not addressing this question. The responses demonstrated that some tutors had given thought to why they were using gamelan and were aware of its benefits. Many of these were similar to themes identified in the literature review but there were also new ideas, suggesting that interviewing these tutors could elicit more information about the benefits of using gamelan with special needs groups and populations.

6.5 Summary

The information collected through this mapping exercise has given a comprehensive picture of the spread and nature of gamelan work being carried out with special-needs groups and populations in the UK. There are some limitations to the exercise; not all groups or tutors responded, and some names or contact details for gamelan were not found, therefore it is possible that other special needs work is being undertaken which has not been identified. However, some information was received for the majority of the gamelan identified, and the same tutors were repeatedly identified as undertaking this work; therefore I believe sufficient information about this work has been collected which will inform the next stage of the study. The information from the fifteen responses will be used to select a purposive sample of gamelan tutors to interview.

The following chapter describes the interview procedure, the results and the method used for analysis, leading to the identification of themes relevant to the research questions.

Chapter 7. Semi-structured Interviews

In this chapter the methods used for interviewing gamelan tutors will be set out, followed by an analysis of the results and consideration of their relevance to music therapy practice. The interviews form the major data collection aspect of this study, and aim to explore in depth the reasons for gamelan being used in work with people who have special needs and special populations, and the particular aspects of it which make it effective in this work. By interviewing tutors who have worked with a wide range of children and adults in different settings, it is hoped that the themes already identified in the literature reviews can be examined and unpicked in more detail and that new themes and ideas will be identified.

7.1 Rationale

As discussed in chapter five; 'Methodological Overview', in order to examine in depth the nature of gamelan tutors' work with people who have with special needs and with special populations, it was decided to interview a selection of tutors. The format of a semi-structured interview was chosen as the method most likely to elicit the information sought for the research project. A structured interview with strict control of the wording and sequence of questions requiring 'limited option responses' (Denscombe, 2007, p.175) was not appropriate to the exploratory nature of the study, in which the interviewees' possible responses were not known beforehand. Whilst having a set of topics and issues to be addressed, the researcher wished to let the interviewees expand freely on these, to develop their thoughts and ideas around them. An unstructured interview in which the conversation can go in any direction that the interviewee wishes may not have ensured that all the research topics were addressed. Denscombe (2007) suggests that both the semistructured and the unstructured interview have the same aim of 'discovery' and are on a continuum, with most interviews tending to move to and fro along this scale. Using the semi-structured interview format therefore seemed a method which would allow sufficient flexibility to strike the right balance between free and focussed discussion.

7.2 Selection of Interviewees

The information used for the selection of tutors to interview was gathered from an analysis of the responses received in the mapping exercise (previous chapter). In order to produce as much detailed data as possible several criteria were taken into consideration:

- The full range of different client groups and populations worked with to show the most possible uses of gamelan
- Different types of gamelans to see whether these may have different uses or effects
- Range of settings in which takes place different ones may affect the work differently
- Settings which have bought their own gamelan may be more consideration of the possible uses of the gamelan
- Number of years of experience tutor has with this work longer experience may produce more developed thoughts
- How much of the tutor's work is in this area those who focus on special needs work may produce a fuller response
- Range of client groups worked with for individual tutor one tutor able to talk about several areas producing richer data
- Enthusiasm shown in responses to mapping questionnaire full response to 'additional thoughts on work and effectiveness' question demonstrates potential for rich interview
- Range of tutor approaches demonstrated in mapping questionnaire to produce wide range of data
- Whether tutors works with special needs groups with other instruments/music – may have thoughts on comparison of gamelan to other music
- Practical feasibility of conducting interview

7.2.1 Review of respondents' answers:

All the mapping exercise responses were reviewed against the above criteria and tutors were assigned to one of three categories: interview, possible interview or not interview. First priority was given to ensuring that all client areas were covered by the respondents selected and that all different gamelan types were included. Thereafter criteria were not ranked but as many variables or differences were included as possible to allow the widest range of responses.

Figure 3 Chart showing analysis of tutor responses:

4 client areas. Only respondent to use Balinese gamelan regularly. Conducts sessions in a professional orchestra educational setting. Fairly broad range of work including ALD, adult mental health and hearing impairment. Regularly works with ALD, less frequently other areas. Only tutor to use Balinese gamelan and hearing impaired. Respondent 2. Gamelan: Central Javanese and Balinese 5 client areas. Experienced. Wide range of client groups, LD young and older children, only person talking about excluded children, and adults and young people with physical disabilites. Does latter work in specialised setting with own gamelan. Also does a lot of this work, is major activity in his employment. Respondent 3. Central Javanese 5 client areas. Only respondent to list visual impairment; service has purchased own gamelan. Also special needs children, prisoners and young offenders. Has range of types of work: one-off, weekly and long-term. Also works with gamelan just bought for a music service. INTERVIEW Respondent 4. Central Javanese and West Javanese Gamelan Degung 4 client areas. Only respondent to regularly use Gamelan Degung. Range of clients, main respondent to work with the hearing impaired, also young offenders and school children with LD. Also works with other professionals including orchestra musicians and a musician- in-residence at school for deat; has range of different experiences to talk about. Wrote large amount in answer to question 6 – obviously very enthusiastic about the work and gives it much thought. Is likely to give rich data in interview. Respondent 5. Central Javanese 3 client areas. Main employment is runni	Respondent 1.	Gamelan: Balinese Gong Kebyar and Angklung		
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very few respondents to work 1:1 with clients.				

Respondent 7 Central Javanese 6 client areas. Children with learning disabilities, physical disability and hearing impaired, also adults with brain injury. Wide range of types of work. Most work in a concert hall setting. Very experienced – 10 years. Showed much enthusiasm in response. INTERVIEW Respondent 8		
adults with brain injury. Wide range of types of work. Most work in a concert hall setting. Very experienced – 10 years. Showed much enthusiasm in response.		
experienced – 10 years. Showed much enthusiasm in response. INTERVIEW		
INTERVIEW		
Respondent 8 Control Javanese		
3 client areas. Prisoners, children with autism and behavioural problems. Very full answer to		
question 6, taken from UG dissertation on gamelan use in prisons. Has studied and written		
about this area – likely to be able to give considered and detailed responses.		
INTERVIEW		
Respondent 9 Central Javanese		
5 client areas. Mainly ALD, children. Also High Security Hospital. Settings include psychiatric		
hospitals. Large range of types of work.		
POSSIBLE INTERVIEW		
Respondent 10 Central Javanese, Balinese		
2 client areas. Works a lot with young offenders. Experienced - has done this for 9 years.		
Very brief reply.		
POSSIBLE INTERVIEW		
Respondent 11 Central Javanese		
5 client areas. Adult and child learning disabilities and prisoners and young offenders. Quite		
experienced - 9 years. Does one-off workshops and week-long residences, sometimes 2		
weeks.		
POSSIBLE INTERVIEW		
Respondent 12 Central Javanese		
4 client areas. Mainly children with learning disabilities. Long experience, 15 years. Mainly		
one-off workshops, little other. Has written a great deal about his work and his approach,		
therefore this information can be gathered without interview.		
POSSIBLE INTERVIEW		
Respondent 13 Central Java, Degung		
Very little experience in this area – only 'individual students with special needs within a mixed		
group' Therefore did not give answers to most questions.		
NOT INTERVIEW		
Respondent 14 Central Javanese		
2 client areas. Range of types of work. Quite experienced but long in the past. Not very full		
replies.		
NOT INTERVIEW		
Respondent 15 Balinese Angklung		
4 client areas. Mainly adult and child learning difficulties in one-off workshops. Did not answer		
all questions. Appears to be work in the past.		
NOT INTERVIEW		

After analysing the responses against the criteria, respondents 1-8 were selected to interview. This selection covered all the different instruments, settings, clients and ways of working, and also took into account any 'unique' aspects of the respondents work described, such as being the only respondent to work with orchestral musicians, or to do individual work with participants. It became apparent that respondents 6 and 9 worked as a pair in much of their described work. Whilst it was initially decided that it was therefore not necessary to interview both tutors, it would have been difficult and potentially sensitive to choose only one, therefore respondent 9 was added to the definite interview list. Respondents 10-12 were selected as possible interviewees. They did not offer any criteria not already covered in the first nine, but could be used as back-up participants if any of the selected interviewees were not able or declined to be interviewed.

Respondents 13-15 were not selected as their answers indicated that they were unlikely to be able to offer full or rich data, mainly due to a lack of experience in this area of work, or the experience taking place a long time ago with the tutor unable to recall much detail about it.

7.3 Development of interview topics

The purpose of the interviews was to explore the work being undertaken by gamelan tutors with non-mainstream participants; to find out what sorts of client groups and populations tutors were using gamelan with, what activities they were doing and their reasons for doing so. It aimed to draw out the tutors' thinking about what gamelan has to offer people with particular disabilities, needs or living situations. Whether any of this work was therapeutic, or had implications for developing therapeutic work with gamelan would be ascertained from the interpretation of the data analysis. However, I also felt it would be useful to see if the tutors themselves considered their work as therapeutic or had thoughts about this topic, so this was included as a topic question.

Kvale (2007) describes The Interview Guide as an outline of topics to be covered with some suggested questions. He states that a good interview questions should have two aspects, thematic and dynamic; thematically it should relate to the research question and produce knowledge, and dynamically it should contribute to a positive and flowing interaction. Smith, Flowers and Larkin (2009) describe the Interview Schedule used in Interpretative Phenomenological Analysis as the setting out of questions which the researcher would ideally like to ask, in an appropriate sequence, which can be drawn upon during the interview. However, whereas in IPA the main purpose of the interview is likely to be 'to enter the participant's life-world or allow the participant to recount their life experience' (Smith, Flowers and Larkin, 2009, p.58) the interviews in this study were aimed at producing more focussed information aimed at answering the research questions. Therefore it was necessary to develop specific topics to be talked about that enabled all the required areas to be covered. Using the themes identified through the literature reviews and the responses given to the mapping e mail, six topics were chosen for interviewees to talk about. These asked for a mix of factual and subjective information. In addition, for each topic a series of potential follow-up questions or prompts to explore the topic was designed. Factual information sought related to the people worked with, the instruments and activities used, and the structure of the work. Subjective information related to the interviewees' views on participants' responses, and their thinking behind their work, what they chose to do when, what was effective, and what the aims and outcomes of the work were. In addition, as described earlier, they were asked their opinions on the possible therapeutic nature of gamelan playing. A particularly strong theme which emerged from all aspects of the literature review was how important the group aspect of gamelan playing was in both traditional and western usage. This also had possible significance for group music therapy; therefore it was added as a prompt question.

As suggested by Smith, Flowers and Larkin, (2009), the sequence of topics was arranged so that the topics moved from those which were more descriptive to those which required more analysis or reflection (p.59). This allows participants to become more familiar with talking first before moving into more challenging, thoughtful questions. The nine types of interview questions identified by Kvale (2007); introducing, follow-up, probing, specifying, direct, indirect, structuring, silence and interpreting questions were also used to inform the interview style.

7.3.1 Pilot Interview

In order to test the interview schedule a pilot interview was conducted with a gamelan tutor who had a small amount of experience working with people with additional needs. The topics given to the tutor were:

1.	Your background and relevant experience in gamelan and other areas
2.	The client groups or populations you are working with or have done so in the past
3.	The nature of the gamelan work – how you use the music and instruments
4.	Practical aspects of the work, set-up, group size, frequency of sessions etc.
5.	Aims and outcomes of the work
6.	Your thoughts on the appeal of gamelan, its unique aspects etc.

The full schedule used with prompts is in appendix C

The interview was recorded and transcribed by the researcher, following which the overall effectiveness of the interview questions and sequence was reviewed and modifications and refinements were made. Some questions or prompts were found to be confusing, unclear or did not produce the intended information. It was found that the answers to later questions often came up during others, so the sequence of questions was changed so that more factual questions were grouped together at the beginning of the interview, leading into questions which were more reflective and subjective.

7.3.2 Review of pilot interview

Topic 1 - 'Your background and relevant experience in gamelan and other areas' worked well in general. It was a useful opening 'warm-up' question which asked for mainly factual information which did not require too much thought to answer, and also set a context for the interviewee's experience. The order of prompts was changed slightly to begin with their overall background and them moving on to gamelan.

Topic 2 – 'The client groups or populations you are working with or have done so in the past'

The tutor began by giving information asked for in topic 4 – 'Practical aspects of the work, set-up, group size, frequency of sessions etc'. These two topic questions were therefore reviewed and redrawn; all practical aspects regarding participants, group size, type and frequency of sessions were gathered into topic 2, and all subjective aspects requiring the interviewee's views on topics such as responses of clients and staff were put into a separate question. This was renumbered as topic 3 to follow on from the previous topic allowing for a more natural flow and for the possible combining of answers by the interviewee.

Topic 3 – 'The nature of the gamelan work – how you use the music and instruments'

This was answered quite easily without requiring many prompts. When used, prompts were clear and appropriate. The exception was the prompt 'How important

is the 'group' in the work? The interviewee did not understand the question, and attempts to redefine it did not appear to make it any easier to answer. The concept of 'the group' appeared to be much more defined for me, as a result of the literature review and as a therapy concept, so was possibly not appropriate to suggest it had importance to the interviewee. Therefore I decided to leave this specific question out of the final schedule, and see if any discussion of the group nature of gamelan flowed out of answers to other topics in a more natural way.

Topic 5 – 'Aims and outcomes of the work'

This was answered clearly with prompt areas being covered in the natural flow. The prompt 'Any negative experiences you have had with gamelan?' was found to be confusing; the interviewee focussed on his own subjective experience, what 'negative' meant, and talking about staff relationships and the settings, whereas the aim of the prompt was to elicit whether participants had shown any negative reactions to playing the gamelan. This prompt was therefore redrafted as 'are there any situations where you feel gamelan or gamelan workshops would not be appropriate to use, from your experiences so far?'

Topic 6 – 'Your thoughts on the appeal of gamelan, its unique aspects etc.' This was found to be the most unworkable area. The interviewee responded that he did not think gamelan was unique, and could not use this word to describe any aspects. However, having suggested that much of what was undertaken with the gamelan could be done with other instruments, the interviewee went on to list a range of positive attributes which he felt were different to other ensembles. This appeared to show that the interviewee did have in mind specific aspects of the gamelan which made it different, but asking what made it 'unique' did not elicit this information. Part of the problem may have been asking *what* was unique, rather than ascertaining first *whether* anything was unique. The topic was therefore redrafted to ask what the interviewee thought the appeal of gamelan was, and secondly, whether they felt there was anything 'special' about it in contrast to other instrumental ensembles.

7.3.3 Final Interview Schedule

Figure 4 Final Interview Schedule

1.	Tutor's background and relevant experience
	What is your background; general and gamelan?
	Are you a professional musician, teacher?
	How and why did you begin working with gamelan
	What teaching have you done with gamelan?
	Do you have any training to work with special needs groups?
	Do you have any training in teaching gamelan, how do you decide how to do it?
	Have you had any training in working with special needs groups, general or specific to
	gamelan?
2.	Practical aspects of the work with special needs: group size, frequency etc
	Who exactly do you (or have you in the past) worked with and why?
	Where do they come from – how do they get there?
	Set-up of the work, groups - size, and frequency of sessions, one-off workshops, weekly classes
	etc.
	Location, type of room, setting
	Funding – who pays?
	Which gamelan do you use – type and owner
	What sort of size groups do you find works or doesn't work
	Do you do much 1:1 work, why yes or no?
	What do you find the best frequency?
	Positives and negatives of different ways of working, e.g. one-offs, week- long residencies
	Do you have co-workers in the work? If so, who, what is their role
3.	The client groups or populations worked with
-	How do they respond?
	What do you think your clients get from their gamelan experiences?
	What feedback from clients have you had?
	From people and professionals involved with your clients?
4.	The nature of the work – how you use the music and instruments
	How do you teach gamelan?
	Do you teach in the traditional manner (aural, rote)
	Do you adhere to traditional customs in your work (eg shoes off etc)
	Do you teach traditional gamelan pieces
	Do you use traditional ways or structures of playing the instruments
	Do you need to adapt these in any ways?
	What other ways do you create the musical structures
	Do you use the gamelan alongside other traditional arts, ie wayang or dance?
	Do you combine gamelan with anything else, other instruments or art forms?
	Do you use improvisation? If so, how and why?
	Composition?
5.	Aims and outcomes of the work
J.	What are your aims in your work with each client group – what is the purpose of the
	workshop/class
	Are there any 'secondary' benefits you notice which are not your defined aims?
	Do you choose different gamelan for different purposes?
	Are there any situations where you feel gamelan or gamelan workshops would not be
	appropriate to use,
	from your experiences so far?
	Have you adapted the way you work over time? In what ways?
	Can you compare this work to any other you do a) With same clients but with different
	music/instruments
~	or b) With gamelan but not with special needs groups?
6.	The particular appeal of gamelan
	What do you think is the appeal of the gamelan?
	Is there anything 'special' about gamelan in contrast to other instrumental ensembles?
	How is it effective, for what?
	Do you have any thoughts on the importance of the group nature of this music?
	Does this lead to any other developments?
	Do you think there is anything 'therapeutic' about using gamelan?
	Would you call your work music therapy?
	Anything else you would like to say that has not been covered?

7.4 Interview procedure

Interviewees were offered the opportunity to choose the place of interview and a mutually convenient time. The researcher travelled to the location of six interviewees, three elected to be interviewed at the researcher's workplace or home. The interviews took place over a four month period.

Interviewees were sent an information sheet and consent form, previously approved by the University Ethics panel which they were asked to read before consenting to be interviewed. Approximately two weeks before the planned interview they were also sent a short interview procedure document which included a list of topics which they would be asked to talk about in the interview. These are shown in appendix D.

As far as possible, a comfortable room or space was used with a table between researcher and interviewee for papers and equipment. A small digital recorder with one microphone was used to record the interview, together with a back-up minidisc player and microphone in case of failure of one device. I began by taking the interviewee through the information sheets and consent form to check that they were understood and agreed to, and then explained the format of the interview, answering any questions which arose. The place of the interviews within the overall research project was briefly explained. Interviews lasted between one hour and one hour fifty minutes, with most lasting about one hour and twenty minutes. A short break was taken during the interview if needed by the interviewee.

My stance was one of open enquiry and interest; I attempted to create a 'two-way dialogue' (Taylor and Ussher, 2001) by responding to the interviewee and the content of their answers in a range of ways. Through the use of prompts, probes and checks (Denscombe 2007, Robson 1993) I strove to facilitate an in-depth discussion through which the subject areas could be explored. Sub-questions listed in the interview schedule were used as prompts, to help the interviewee think and talk about the topic, probes were used by making comments to draw out further thoughts or information where I thought the interviewee had more to say, and checks were made to ensure that I had understood answers correctly or to clarify

meanings, by summarising or reframing the interviewee's responses. In addition, the psychodynamic counselling style in which I am experienced was used to encourage a reflective, thoughtful and non-judgemental tone to the interview. This has some similarities to the 'prompts, probes and checks' of interview technique, asking clients to expand on their thoughts, to reflect on meaning and using silence at times to leave a space for ideas and understanding to develop and deepen. Another helpful aspect of counselling practice with which I am familiar is that of the counsellor not giving her own opinions on the subjects being discussed by a client. This experience made it easier for me to maintain an 'active listening' approach (Kvale, 2007) to what the interviewee was saying, keeping my own thoughts about the topics under discussion to myself. Thus I attempted to establish a comfortable rapport with interviewees, through which they would feel at ease and able to express their ideas without fear of criticism or judgement.

The interviewee was invited to talk about each topic area in any way they wished, usually beginning with a question from the researcher such as "Can you tell me about....(a topic area)?". The questions were used flexibly, and lines of discussion were allowed to develop naturally. The sub-questions were used to elicit more information on the topic area where needed. Some topics were covered in a different order or were talked about together with other topics. During the interview I wrote some notes on the areas being discussed to monitor whether all the topic areas had been covered in some way and to note any particular observations about answers that occurred to me. Towards the end of the interview I suggested a short pause for reflection in which I looked back over my notes to check that I had covered all of the main questions, and if not, asked them. I also asked the interviewee if there was anything else they wished to add, or talk about a topic that had been missed out. Two interviewees had brought notes in response to the question areas I had previously sent, and they reviewed these.

7.4.1 Researcher – Interviewee relationship

As a gamelan player of many years' experience, it was inevitable that I would know some of the interviewees already, from playing in gamelan together; however several were previously unknown to me. Given the small community of gamelan tutors in the UK and in order for tutors to feel able to talk freely about their work and their opinions, it was felt to be particularly important to emphasise the confidentiality of the interviews, and that all places and names would be made anonymous in the study. Interviewees were not told the names of other people being interviewed. For interviewees with whom I already had a relationship, care was taken to structure a safe and slightly more formal interaction to usual, in which the boundaries of the interview procedure were made clear and by asking the interviewee to try not to make assumptions about what I might already knew about them and their views. I had not discussed the study or the thinking behind it in any depth previously with any of the interviewees. In the interview question section which referred to therapeutic aspects of gamelan and music therapy, I acknowledged that the interviewees were aware that I was a music therapist, and as such I was likely to have particular opinions about what constituted music therapy or a music therapist. However, I encouraged the interviewees to be as open as possible in their views and responded positively to any answers to this section.

7.5 Analysis of interviews

I will now describe the process of analysing the interview data, beginning with a brief rationale for the method used.

7.5.1 Thematic Analysis

The interviews were analysed using the Thematic Analysis method as defined by Braun and Clarke (2006). The full rationale for this choice of method is given in chapter five, 'Methodological Considerations'. Boyatzis (1998) describes thematic analysis as a process that can be used with many other qualitative methods rather than existing on its own, whereas Braun and Clarke consider it as a method in its own right. They suggest that much analysis which is either named as another method or not identified at all is in fact thematic analysis, and that therefore a clearly defined method which makes explicit how data was analysed is required. This study makes use of that method to analyse systematically the interview transcripts and to produce themes. It also makes use of the work of Boyatzis (1998) for undertaking thematic analysis. Boyatzis lists three different ways to develop thematic codes: 'theory driven, prior data or prior research driven and inductive (i.e., from the raw data) or data driven (Boyatzis, 1998, p.29). This research was data driven, in that all the themes and codes were generated from the interview transcripts. Braun and Clarke (2006) divide thematic analysis into six phases : familiarising yourself with your data, generating initial codes, searching for themes, reviewing themes, defining and naming themes and producing the report. These phases were used as a basis for the analysis of this data.

7.5.2 Phase 1: Familiarising yourself with your data

All the interview recordings were listened to and transcribed verbatim by the author. Whilst the level of transcribed detail was not as high as that needed for methods such as discourse or conversation analysis, that is, not all "er"s or "um"s were transcribed, the exact words used were written down, and pauses and significant moments of laughter or other emotion were noted in the transcription. Punctuation was used to make the meaning of the account clear. The repeated relistening to the recordings and the typing afforded me a high degree of familiarisation with the texts. An example of a transcript is shown in appendix E.

I then read the transcripts through again and began marking interesting sections of text, with a note in the margin describing the idea, as very preliminary codes. At the same time I wrote a list of ideas as they occurred in the account for each interview. Boyatzis (1998) describes the search for a codeable moment as where one begins to sense a theme. I was noticing moments which told me something about what gamelan tutors did in their work, who they worked with, what they did and why, and where they had an interesting idea about their work which showed their thinking. At the end of this stage for each interview I had a transcript with portions of text underlined, rough notes in the margin adjacent to this text, and a list of ideas which occurred as I had read the transcript.

7.5.3 Phase 2: Generating initial codes

The transcripts were then reprinted with numbered lines, to make identification of text extracts easier, and read through again. I referred to the first coded transcript and the list of ideas for each interview. By looking at these together I began to develop thoughts about what were important ideas. These I highlighted on the text, and wrote more refined codes in the margin of the page. Whilst keeping the research questions in mind, I attempted to code as openly and systematically as possible, without anticipating any themes ('Open coding', Boyatzis, 1998) . During this stage I dropped some ideas, found some new ones and refined the first codes. I

then checked back over the transcript to see if any of these codes applied to any text as yet un-coded in the interview. At the end of this stage, for each interview I had a numbered transcript with portions of text highlighted, and codes for this portion of text written in the adjacent margin of the page.

Figure 5 Example of initial coding

550	in the second seco
331	Yeh I think about using the instruments in traditional ways so for example I would
332	expect if we were going to have a beat we'd probably play it on the kempli, but we
333	wouldn't always have a heat we wouldn't always have someone playing that. And
334	using the gongs to give a bit of structure to something you know, giving a beat on frocknow
335	a significant point and um you know, like I said I remember there's one particular resolution
336	person that was really good with melodies, that would just make up lovely tunes,
337	so I would say 'can you play that maybe on the tromping' cos that would sound
338	really great, you know. That's the role the trompong has, to be lead melody and so
339	to some extent thinking about the instruments how they're used fairly traditionally.
240	But then again word he playing melodies on the iegog We'd he getting different

7.5.4 Phase 3: Searching for themes

In order to begin the process of looking for themes, for each interview transcript I copied each segment of highlighted text or its line number into a table, with the code in a second column. Each interview was assigned a letter, and the transcript line number linked to this. A coded transcript is included in appendix F. An example of this process is given here:

Data extract:	Coded for:
I suppose the sound, yeh, definitely the sound world A917	Sounds very special
the gongs I think are just so powerful for so many people, you know they don't, I mean they look kind of amazing cos they're so huge but they don't look as they sound. You know people go up to them and they go, 'oh my word' and everyone wants to play them, everyone's attracted to that sound, and everyone's sort of amazed the first time they hear that. I think there's something really captivating about that sound. A918	Appeal of gongs
And whether or not that has a resonance with people physically as well, you know sometimes people say it's a quite calming sound. A925	Calming effect
I know that that means a very, well I think it means a very specific way of working with people that's more kind of psychotherapeutically based and I'm not trained or working in that way. But it's certainly therapeutic, A970	Is therapeutic but not MT
they've enjoyed it, they feel more confident or more comfortable being together in the group or, more comfortable with playing music. A983	Positive outcomes
It's that sort of thing that I have in the back of my head that I think everyone should get a the chance to do music A987	Aim- equality of access to music
you know, as normal adults, we can go and choose when we make music but actually a lot of people don't have that opportunity unless A993	Disabled people have less access to music playing

Figure 6 Example of coded text

Once a table had been produced for each transcript, they were then cut up into individual data strips. This produced about 740 data strips, or coded segments.

The next stage of analysis was the initial generation of themes. The data strips were gathered together and each strip read and placed on the floor together with any strip which seemed to be related or have a similar idea. This was a long process which involved creating many smaller piles, re-reading the data strips, putting them into different piles, and then combining piles as a thematic area began to become clearer. When I felt that there were no more thematic areas to be found from rearranging the data strips I was left with 23 data piles.

Figure 7 Data piles



I gave each pile a title to describe the topic of the data. These were the 'candidate' themes (Braun and Clarke, 2006, p.90). Additionally there was one small pile for miscellaneous data strips which did not seem to fit anywhere.

Figure 8 Titles of initial data groupings: Candidate themes

Where and who work with	Type of session and frequency
Type of gamelan and tuning	Set-up issues
Co-workers	Gamelan combined with other things
Adaptations	Tutor's personal experience of gamelan
Tutor's own training	Etiquette and tradition
How teach and philosophy	Musical structures and techniques used
Aims of work	Benefits of playing
Therapeutic: qualities and approach	Appeal of instruments
Appeal of music	Importance of group
Range of abilities	Difficulties, negative outcomes
Participant responses - general	Participant responses - client-group specific
Political issues	Miscellaneous

I did not consider prevalence in identifying and using codes (Braun and Clarke, 2006 p.83). The purpose of this analysis was not to identify the most common ideas, or to rank them according to strength, but to look for any ideas which I considered had relevance to the research questions, ideas about the ways people worked that could be of relevance to music therapy. For example only one interviewee talked of how she selected specific instruments of the gamelan according to a particular client group being worked with, such as choosing a barred instrument according to the type of resonator it had for work with the hearing impaired. However, this could be a very important idea for therapeutic work, so is given equal importance to ideas mentioned by several interviewees, such as the importance of the visual appeal of the instruments.

7.5.5 Phase 4: Reviewing themes

Taking each theme, I wrote the codes contained within it on a large sheet of paper and looked for groupings within them. Coded ideas with related characteristics were clustered (Boyatzis, 1998, p.136) and then lines drawn to connect clusters and ideas, beginning to create a thematic map. Once I had made a series of connections for different coded ideas, these were amalgamated into a sub-theme. For example, the theme: 'Benefits of playing' generated six sub-themes. The ways the raw codes were grouped to create three of these sub-themes is shown below:

Codes	Resulting sub-theme
Improve and learn new musical skills	Musical benefits
Regain confidence in musical abilities	
Way back to music (musician)	
Take new musical role	
Gain a musical identity	
Way to other musical activities/instruments	
Unfamiliarity means level playing field	
Listening	Develops group skills
Tolerance of others	
Conflict resolution	
Cooperation	
Work as team	
Group spirit	
Break down resistance	Transformative experience
Go through blocks	
Allow self to participate, be enthusiastic	
Naughty to responsible child	

Figure 9 Example of theme development

Some data piles were more factual and as such did not have subjective themes, rather procedural information, such as the client groups worked with, or the types of gamelan used. However, there were also subjective elements within these themes, such as, when probed into why a particular gamelan was used, the interviewee might answer not only that it was the set available, but give more thoughts as to why certain gamelan work better with different participants or in different settings.

This process of clustering and connecting coded ideas was repeated until no further sub-themes could be found for each of the 23 candidate themes. These thematic maps were then typed up creating a list of 23 candidate themes and related subthemes. The full list is included in appendix G.

7.5.6 Phase 5: Defining and naming themes

In the next stages the themes and sub-themes were reviewed and ways to combine them considered. They were again written on large sheets of paper and connections looked for. (examples of these sheets are included in appendix H). Through repeating this process and combining themes in different ways, a range of overarching themes began to emerge. Some of these were more about practical and procedural matters, and others were more subjective and related more to the research questions. Therefore, I next focussed specifically on the research question of what could be therapeutic about gamelan playing in order to generate the most relevant themes which would become the Key themes, a theme which 'captures something important in relation to the overall research question' (Braun and Clarke, p.82). This led to some themes from different data piles being linked and other themes left which, whilst interesting, were of less direct relevance to the research questions. So for example, the Key theme 'Accessibility' was developed from aspects of the themes of 'Adaptations', 'Appeal of instruments (ease of playing)' and 'Appeal of music (flexible musical structures)'. This stage of the development of the Key themes is shown in appendix I)

From the overarching themes remaining which did not relate as directly to the research questions, two further groupings were identified: one concerning

procedural and practical matters, and one concerning the tutors' background, experience and aims. These will be presented later in the chapter.

At the end of this process six Key themes were identified which were considered to be the most relevant to the research questions. Each Key theme contains several sub-themes; these are presented in the chart below.

KEY THEME (KT)	SUB-THEME
KT1: ACCESSIBILITY	Can see how to play it
	Physically easy to play
	Sounds musical straight away
	Accommodates range of abilities
	Is highly adaptive – different ways to create sound
KT2: ENCOURAGES	Visual appeal and value of instruments
ENGAGEMENT	Sounds and music
	Physicality of instruments
	Lack of preconceptions
	Enjoyable experience
KT3: OFFERS MANY GROUP	Is group of instruments forming one instrument
WORK POSSIBILITIES	Inherently group music
	Development of communication and social skills
	Learn how to work together as group
KT4: THERAPEUTIC EFFECTS	Instruments' sounds
	Wellbeing
	-mood change
	-catharsis
	-transformative
	Synchronised playing /Group flow
	Therapeutic potential
KT5: SENSORY RANGE	Vibrations
	Timbre
	Textures and smells
KT6: CULTURAL HERITAGE	Keep link to the culture
	Sense of occasion
	Etiquette and traditions
	Values and possibilities of traditional music

Figure 10 Key Themes:

The Key themes will now be described, as the last of Braun and Clarke's six stages.

7.5.7 Phase six: Writing the report - Description of Key themes

In this section I will describe the Key theme and sub-themes in more detail. The ideas, opinions and beliefs presented are those of the interviewees. My own

thoughts and interpretations of these ideas will be given in the subsequent discussion section. Descriptions of themes are illustrated with examples from the interview transcripts which were used in the development of that theme.

7.5.7.1. KT1: Accessibility

All tutors talk of how accessible the gamelan is as a way for people to play music and instruments, regardless of any disabilities, difficulties or prior musical experience they have.

Sub-themes: Can see how to play it; Physically easy to play

Most of the instruments are seen as easy to play and not requiring a high degree of skill or prior experience. A key point made is that it is visually clear how a sound should be made for most of the instruments, people can recognise that if you hit a bar with a mallet it will make a sound, so there is much that they can work out for themselves. Playing requires very simple one or two-handed coordination. The fact that it can be 'hands-on' experience straight away makes it very accessible for people who would not be able to tolerate a long period of explanation and instruction first.

But, the fact that "I've not played this before, what's this do, it looks like a hammer, ok I can just sort of hit it, that's not too difficult" you know. It's actually quite a physical thing, gamelan playing. It's not as scary cos you can see how all the sounds are made straight away, you know I can hit that gong and it make this sound' and it's "wow, I've done it already". I think that's a big part of the appeal, when people realise how accessible it is.' (Tutor A)

Sub-theme: Sounds musical straight away

The specific tunings of gamelan are felt to be a key factor in the accessibility of the music. The notes and scales are pre-prepared and are therefore already 'in tune' unlike, say a stringed instrument. The notes are tuned to various pentatonic-like scales of 4, 5 or 7 tones. All the sounds go together, so players are unlikely to create dissonance or feel 'out of tune' with themselves or others when playing for the first time. Participants have immediate success, they can make a beautiful sound straightaway, which is rewarding and encourages people to continue. Tutors compare beginning to play the gamelan to beginning to play other instruments

such as percussion or recorders, pointing out the value of being able to make a good sound immediately.

'There's something with the gamelan as opposed to a lot of other percussions, especially small percussion work that we do is that it sounds awesome! It sounds awesome from the start, like you don't need to have a really good well-developed physical skill or physical control to get an amazing sound out of the gamelan, and I think that's a very good thing. Whereas if you have people with a load of guiros and small drums and whatever it's, you can't, I guess that's about other projects which aren't very well equipped but the actual sound of the gamelan is so compelling and I think it's easy to make something good straight away.' (Tutor D)

Sub-theme: Accommodates range of abilities

A range of playing abilities can be accommodated within the music; different levels of physical dexterity are needed, so all can find something to play. Different playing actions can be accommodated and therefore people's different physical abilities worked with. As within traditional gamelan music there is equal importance of all parts, even if someone can only hit something very slowly or infrequently for example, they can still be integral to the playing and be 'good' at it. The instruments do not need to be held or supported; they are all set on the floor or hanging from stands, making them more accessible for people with physical difficulties, or a lack of coordination or strength.

Players and instruments can be positioned in various ways to enable them to play; some stand at an instrument if it is put on a raised table and the person is supported by a walking frame. For groups of elderly people the instruments were put on to stage blocks so that participants could sit on normal chairs to play rather than the floor. For wheelchair users some instruments were put on raised platforms or tables. However, this is not all always possible and some tutors feel that the difficulty in reaching an instrument can occasionally be a barrier to participation.

Sub-theme: Is highly adaptive - different ways to create a sound.

There are different ways to create sounds, the beaters can be changed, for example swapping the heavy gong mallet for a lighter one, or using different percussion beaters or adapted beaters if needed. These can be easier for people with limited fine-motor control to use, and can be a way to have more control over the sounds, for example if the traditional mallets produce too loud a sound which the player does not have the ability to control. On some instruments, the notes can be rearranged to assist in the playing, for example visually impaired children moved the bars around on their instruments to an order which made it easier for them to find the right notes for their composition. Similarly, bars can be removed if players do not want to play them by mistake.

People with physical disabilities can use their wheelchairs to assist in making sounds. An example is given of a person holding a beater in one hand, then using the joy-stick of his electric wheelchair to move himself round quickly and strike the hanging gong. This is valued as a way to give someone with very limited mobility and strength the experience of making a big sound.

"...gamelan's really quite different to most of the stuff they get to use normally. And I think it's mainly that and just a chance to explore different sound worlds ... and with the gongs particularly those who are pretty much wheelchair bound, they can hold the beater and move their wheelchair so they can hit the gong and with that little movement that's quite a lot of noise that you get compared to with normal percussion and things. It gives them a lot of kind of, they can produce a lot more sound, a lot more satisfying physical contact." (Tutor C)

Tutors also arrange the layout of the instruments to meet specific aims or needs, for example, in order to encourage interaction, the instruments are placed in a circle so that participants can see each other and make eye contact. The instruments are very solid and robust, they stay on the floor and the players sit at them and move around them.

The music accommodates different learning styles, and can be particularly useful for people who learn best through doing. Players can be shown how to play and can copy and help each other. Most tutors said they rarely use any written notation, although some put coloured stickers on bars and call out which colours to play.

7.5.7.2 KT2: Encourages engagement

Several features of the gamelan combine to make at an appealing and effective package for encouraging people to engage and participate in the playing. The finding of ways to encourage people to take part is described as an important aspect of the work. Some participants do not readily engage with activities for a range of reasons; prisoners may be resistant to trying something that might make them look 'soft', many people are unconfident and reluctant to try new activities. There may also be pre-conceptions about not being musical, or they may have had bad experiences in school music lessons.

Sub-theme: Visual appeal and value of instruments

All tutors describe the visual impact that the instruments have as being a primary factor in the initial engagement of participants. The whole set of instruments have an immediate 'wow' factor; there are many separate instruments of different shapes and sizes, some can be very large such as the hanging gong; they are made of wood and metal and most are covered in carvings and painted red (or another colour) and gold. The beauty of the instruments is mentioned as having a positive effect on participants. There is a novelty aspect as they have not been seen before and it is frequently described as 'exotic'. Interest and imagination are invoked, participants start wondering where it is from, how it got there, and tutors find that discussions begin which engage people straight away.

'I think visually as well ... as soon as people come in they're "wow what's this?" I think sometimes it doesn't even occur to them that it's a musical instrument at first, it's just "wow this is all paintings or something" and people do come in and they are quite gobsmacked, but of course they want to go over and they want to get straight in. They're not frightened of it because they're so fascinated by it they want a go.' (Tutor A)

The perceived value and worth of the instruments adds to the experience. In the prison setting, tutors are aware of prisoners feeling that they are often 'fobbed off with rubbish' and so being given beautiful, 'golden' instruments to play in this environment is particularly powerful. People are drawn in to playing, then the sounds they produce are 'beautiful and harmonious' which confirms their experience that it is worth playing, and importantly, that they are being valued as people worth bringing this music to. Prisoners often ask how much the instruments cost, possibly equating their own value with the value of instruments; the 'privilege' of being allowed to play is mentioned. This latter point was also spoken of by a tutor working with emotionally and behaviourally disturbed children.

'One little boy's teacher was saying he couldn't believe that he was going to see a real gamelan. He thought you know he was going to see other things and he was nearly in tears when he saw the gongs. And she was saying it's because he never gets, people are always saying they are going to give him something and then give him something that's not as good!' (Tutor H)

Linked to this is the importance of instruments being perceived as 'proper' and adult instruments, not what might look like school-room percussion.

Sub-theme: Sounds and music

The sounds of the instruments help to 'draw people in' it is claimed by most tutors. As with the 'Accessibility' theme, the fact that it sounds good straight away is cited as important in encouraging people to get more involved in the activities. The sound qualities and range are viewed as being quite special and interesting for participators. The tuning is not equal temperament and the resonances can be quite unusual and capture people's interest. The harmonies afforded by the tuning mean that people can explore the instruments together without having to learn the 'right way' to play a piece first, and the sounds are still sonorous and pleasant. This can give participants a sense of achievement early on in the activity. It is noted that there can be initial difficulties when using the 7-tone *pelog* scale as this does have the potential for a slight dissonance. Several tutors mention that when given a choice, they do not choose this tuning because of this, although one tutor says that she uses *pelog* when she feels the group would benefit from an 'edgier' sound.

'I think the fact that it is a kind of novelty and most people haven't seen one before or heard one before often draws people in – "oh what does that do, what can I do with this?" and starts thinking about music in a different way really. Rather than saying, "oh I'm not very good at music" ' (Tutor A)

The apparent simplicity of the music engages participants, enabling them to succeed, and encourages their continued participation. Tutors use musical structures to suit participants' abilities, from very simple 2-note pieces to the increased the complexity of traditional pieces, or purely improvised or groupcomposed creations.

Sub-theme: Physicality of Instruments

The solidity and physicality of the instruments, and the physicality of the playing, is felt to be a factor in encouraging people to play. This can be reassuring to some participants, they feel they won't drop or break it, particularly if they lose control in some way. This gives a feeling of safety which is viewed as important for children with autism who reacted very positively to playing it. It is described as having a real 'presence' which affects participants. One tutor suggests that this is a factor in encouraging boys to join in; the fact that the gamelan is 'physical, percussive and loud' means it is not seen as a 'girly' thing to do.

'It's physical, I think that's quite an important thing, it's physical and you have to engage with it in quite a major way. You know you're sat at it, you're on the floor, you're, you've got this instrument which is quite a large physical presence in front of you, it's not a small thing it's... I think that's quite a lot of the appeal of gamelan is the sheer physical size of the instruments. It almost exerts a kind of gravitational pull on you psychologically, that amount of bronze and wood!' (Tutor C)

The multi-sensory aspects of the instruments are cited as particularly important for the engagement of children with severe learning disabilities and/or sensory impairments, some of whom may only engage through touch. The instruments are very tactile; the carvings can be felt and traced with fingers, they have a 'woody smell' and the vibrations of the sounds can be experienced in the body.

The unique way that participants sit amongst instruments in the traditional Javanese gamelan layout, where the barred melody instruments are set at rightangles to each other so a player has instruments on three sides of himself, or is sitting within a square of horizontal gongs (shown in appendix A) is remarked upon by several tutors as giving players a sense of safety and containment.

'one of the things that I find very good about gamelan for working with all kinds of groups but particularly sometimes with groups with special needs is that you get your own little kind of kiosk if you're sat at a saron, you have your own little zone' (Tutor C)

In some work tutors describe children being placed actually within an instrument, the large hanging gong, whilst it is played.

'I mean there's one little girl and she just looked like it [the inside of the gong] was the only place where she felt safe. She'd just kind of curl up into it and... I think generally the instruments, a lot of the children feel very comforted to be amongst them, just because they're so big and they can sort of hide, and sort of nestle themselves. And I think even with young offenders to a certain extent there's something that they like about huddling down amongst these things' (Tutor H)

Sub-theme: Lack of preconceptions

Associated with the novelty of the gamelan, the lack of expectations and preconceptions that people have about it are important. Usually, no-one has seen or played it before which results in a 'level playing field'; everyone starts from the same place. This can help people engage who may be reluctant to try something which they think their peers will be able to do better, or know more about, such as in prisons or Young Offender Institutions. It is also mentioned as relevant when running workshops with mixed ability groups and with a mix of participants, such as disabled clients, their carers' and other staff. It gives the disabled people a chance to be as good as the people caring for them, and is a way for people to do something together on a more equal footing. The inclusion of staff in the playing was also noted as useful in some settings for supporting the participants and helping to break down any resistance they may have to taking part.

Sub-theme: Enjoyable experience

All tutors felt that playing the gamelan could be a very enjoyable experience; participants have a great sense of achievement from the music they have produced. They have fun playing together and it can be a very positive, social activity. This is one of the most important aspects which attracts people to play it.

The sequence of engagement appears to be crucial for many; the visual impact draws people in to try the instruments out, the sounds they produce are interesting and enjoyable (harmonious) which engages them and then they are able to take part and continue with more complex activities and ways of playing. Participant responses described by tutors include enthusiasm, fascination, surprise and amazement.

7.5.7.3 KT3: Offers many group-work possibilities

A feature of the gamelan described by tutors as of major importance is that it is inherently a group activity and as such is well suited to work with a range of different participant groups and aims.

Sub-theme: Is a group of instruments forming one instrument

Some tutors explained that in contrast to some other instrumental ensembles the instruments look and sound like they belong to each other; they are visually a set of related instruments tuned to the same scale. The fact that the gamelan is 'one instrument' is frequently mentioned as important; this gives an immediate sense of the group to participants who, as soon as they start playing, can hear that they are

part of the same group. 'It is an instant group activity' was a phrase frequently used.

Sub-theme: Inherently group music

Traditional music is inherently group music (specifics of traditional music are further explored in Key theme six; Cultural Heritage). There are no soloists, everyone has a part to play in the whole, and of great importance to the ensemble is the feature that everyone is as important as everyone else. Therefore tutors felt they could work with 'whoever comes' to the group; they could find a part playable by anyone. Gamelan is also well suited to other group music- making activities, such as improvisation and composition, which all tutors use in their work. The emphasis on the group nature of gamelan was made by several tutors.

You've got this resource that's not like a normal musical instrument that actually, has it got more, is more than that would offer someone with a hearing impairment than playing a violin. And also something you can do in a group, something that is naturally a group thing, that you have to do in a group or it doesn't really work. And I suppose that's what probably we're really trying to get at with some of the other things I suppose. This isn't something that you're going to take away and practice on your own, you've got to do it with everyone.' (Tutor A)

Sub-theme: Development of communication and social skills

Many tutors list social and communication skills development in their aims for the work. These include developing concentration, self-expression, listening and ability to interact, autonomy and choice-making. Playing music together, whether using the traditional repertoire, improvising or composing is seen as requiring a range of these skills. Traditional compositions offer particular possibilities which are addressed in a separate theme, however, typical gamelan concepts such as the need to listen to each other and to particular instruments to work out aural cues can also be used in creative work. Team work skills such as learning how to listen to each other, taking on different group roles, learning how to negotiate and resolve conflicts are also frequently mentioned, particularly in situations in which people are living together, such as prisons and Young Offender Institutions. Playing together allows people to connect to each other in different, more meaningful ways.

^{&#}x27;what I feel works with these weeks and we are looking at achieving by the end is increased self-confidence and ability for prisoners to work with one another and communicate with each other and be able to accept each other's differing views on things without hitting each other... and just you know a lot of these life skills which

they are not necessarily very good at...and on top of that you know it is a great confidence builder to sense that they can achieve something and it gives them a great buzz by the end of the week and it is an amazing exciting experience for them to be part of this thing...' (Tutor K)

Some tutors working with individual clients who have severe learning and physical disabilities say they still feel they are working with a group, as there will be one or two gamelan tutors and one or two support staff who join in, so the same group principles can apply. With very disabled participants, communication skills are worked with very specifically, such as helping the participant 'eye-point' at the instrument he wants played, with one of the facilitators playing the notes for him.

Sub-theme: Learn how to work together as group

Several tutors describe gamelan as 'community generative'. The development of a group culture is seen as key for the effectiveness of much of this work. Participants learn to support each other, help each other out in the playing, showing which notes need to be played or which section of the piece they are going to. They need to work together as a group for the music to work. The importance of the 'group feeling' to the experience is emphasised by some tutors who relate how soloists, or people wanting to take centre stage, are often resented by the group in a way that might not occur in other music. This mainly happens during improvising or composing, when the group culture has become more important than the individual. Some tutors work towards a performance at the end of the workshop or project and in some prison work, a CD is produced of the music made over the week too. These all emphasise the importance of the group working together.

'it's a massive part of the sort of team building thing and the communication skills, you know, using gamelan for, working on communication skills, is the fact that like I say, you have to be able to function as a group in order to make the music work. It's very hard without, unless you all have an absolutely impeccable sense of pulse and things like that, it's impossible to make the music come together. And even if you are all playing at the right time but not listening, I think it's very hard to give the music a nice shape and a nice sense. You know I mean even things like knowing when to start, and certainly slowing down to end say if you do a slow-down finish. So I think that's really important, you have to work with people otherwise it's not going to happen.' (Tutor G)

In describing the importance of the group community experience, several tutors remembered that this is what drew *them* into playing gamelan in the first place, it is what they enjoyed most about it themselves.

Positive outcomes of group work described include feeling heard and valued by others, developing the ability to cooperate, a way to make new friends and mix with people who one would not normally meet, and experiencing a group spirit. People enjoy the group experience and have fun, and the sense of achievement helps increase their self-confidence.

7.5.7.4 KT4: Therapeutic effects

Several tutors said they felt that playing gamelan could be 'therapeutic' but that they could not really define exactly what made it so.

Sub-theme: Instrument sounds

Several tutors suggest that making music together in a group can in itself be therapeutic, or that all the elements of the beauty of the instruments, sounds and collective experience come together to make it so. The sounds the instruments make, timbres and vibrations are thought by some to have a positive effect on participants, perhaps through the effects on the body.

Sub-theme: Wellbeing

A range of benefits described by tutors are about enhancing well-being in general ways.

Mood change

Gamelan playing has the possibility of raising people's moods, for both tutors and participants; several tutors talk of feeling better after playing for themselves, headaches can disappear, they feel refreshed afterwards, (this applies to playing traditional music). It is emphasised that the 'feeling good' effect is from 'doing' it , not listening to it, as many people who play gamelan do not listen to recordings much.

Prisoners describe it as making them feel 'chilled out', that the music has a 'transporting' quality which can take them far away. This sentiment is seen to have

particular significance in a prison setting. It can be very calming to play and help people to 'de-stress' and relax.

Some tutors working on prison projects cite research which found that playing gamelan had led to a reduction or cessation of self-harming behaviour among selfharming female prisoners.

Catharsis

The cathartic effects of playing the music were mentioned by some tutors. The physicality of playing was described as therapeutic; putting energy into hitting the instruments, and the satisfying sounds produced on the large gongs for example, are seen as a way to 'get out aggression'.

'Another thing that came up there [in prison] was, again about the physicality, the fact that there is a certain amount of force used, and that can be quite a release to be able to do that, but to channel it to productive ends rather than just hitting something for the sake of it.' (Tutor G)

Transformative experience

The 'transformative' nature of playing was described by some tutors; that it enabled people to 'go through blocks', to be able to behave in a different way and to learn something new about themselves. The cyclical nature of the music, 'going round and round' can be hypnotic and people can go into a trance-like state. It can put players into a 'different sort of experiential state' it is suggested.

Sub-theme: Synchronised playing/group flow

Several tutors mention the effects of moving in synchrony in a large group, the 'therapeutic effect of communal physical activity'. In this one can lose selfconsciousness and become part of a larger whole. The therapeutic benefits of 'group flow' and connecting together are also talked about although tutors do not go into detail about what this involves. Sub-theme: Therapeutic potential

Some tutors see potential for gamelan to be used more specifically as music therapy, that some of their work could be therapeutic but that it needed to be taken further by a music therapist. This was particularly in the area of working with children and adults with more severe learning disabilities. The point is also made that just because one is working with music in an area of special needs this does not make it music therapy, nor is it necessarily constructed to be therapeutic. Some tutors are very clear that their work is for musical or educational purposes and definitely not therapy. This distinction is seen as important for some participants, for example, adult mental-health service-users or young offenders are being given the opportunity to have a musical experience, to learn a new skill and put on performances, like any ordinary participants.

In contrast, other tutors emphasise that the learning of a new music is not the primary aim, more a tool for non-musical, more therapeutic goals.

'And so actually the project may seem like it's about Indonesian music, I mean what relevance is that to most people in a prison?! Well it's not actually, it's about self-expression and creativity and just human behavioural skills basically, you know, how we interact with each other, how we deal with conflict and stuff. And I don't go in intending to teach any of that, it's just that, it's great, we've got a music, and not only is it music which...can be a non-verbal art-form, but it's music from an alien culture, and yet here we all are sitting on the floor and playing it together, and all of this other stuff starts to happen, and that's why I think it's a very powerful tool really.' (Tutor J)

7.5.7.5 KT5: Sensory range

Sub-themes: Vibrations and Timbre

A distinctive aspect of the gamelan identified by some tutors as important is the vibrations of the instruments and the timbre of the sounds. These are utilised mostly by tutors working with hearing or visually impaired participants and those with severe and multiple learning disabilities. The vibrations of instruments, in particular the gongs, can be felt and experienced by people in different ways, through the body as well as through the ears. Techniques used include putting fingers on instruments to feel vibrations in the hand and using 'body boards' for hearing impaired children to lie on in order to feel vibrations through different parts of the body.

Being able to hear the instruments in different ways enables people who would not normally be able to take part in group music to play together and have a satisfying experience. It is a way of engaging people with multiple sensory and learning difficulties, in individual or pair as well as group work. Tutors talk of helping participants to 'Make connections between what their hand does and what they hear' and as a way to develop communication abilities. Some tutors choose specific types of gamelan or instruments for work in which longer resonances are needed.

I think there's something very satisfying about hitting something and feeling it vibrate. And there's something magical about the gongs. Wherever you take the gamelan, everybody of whatever age is just fixated and wants to have a go, so I think there's something cathartic about it, and people often say 'oh yeh he's getting his aggression out' at the prison you know. But I don't know if it always is aggression... Because it doesn't look like somebody's rage, I think it's more, it's just something very physical, you know it's like the sound becomes physical.' (Tutor H)

The gongs seem to hold a special appeal, remarked on by almost all tutors. Depending on the set of gamelan instruments being used these can range in size from small to very large and number up to eight, tuned to all the notes in the scale, hanging from a frame. Soundboards can be laid out underneath the gong frames for participants to lie on; one tutor talked of blind, hearing impaired, physically and learning-disabled child being placed in the gongs, to just experience the sounds in whatever way she could. Another child enjoyed having a 'gong bath', lying on boards being surrounded by the sounds of all the gongs. The large gong holds a great appeal for most participants, not just the sensory impaired. It is often the instruments that everyone wants to play, and the deep, long-lasting vibrations are felt to be very special and can have a positive effect on some people. Tutors talk of learning-disabled participants taking the tutor's hand to get them to play gong whilst the participant feels the vibrations, the physical sensory stimulation being enjoyed more than playing for themselves.

'the gongs I think are just so powerful for so many people, you know they don't, I mean they look kind of amazing cos they're so huge but they don't look as they sound. You know people go up to them and they go, 'oh my word' and everyone wants to play them, everyone's attracted to that sound, and everyone's sort of amazed the first time they hear that. I think there's something really captivating about that sound.' (Tutor A)

The sound quality, the timbres of the different instruments are often talked about as something almost 'mystical'. It is not only the visual aspects, it is the whole sound world that a full gamelan produces, the resonances that affect people, that are very different to other sets of instruments.

Sub-theme: Textures and smells

The feel of the instruments, being able to trace the intricate carvings with fingers, and the smell of the wood are also described as important aspects of experiencing the gamelan for participants with sensory impairments.

7.5.7.6 KT6: Cultural heritage

Various aspects of the gamelan and the culture and heritage from which it comes are identified as contributing significantly to the experience of playing for participants.

Sub-theme: Keep link to the culture

Some tutors emphasise the importance of linking the gamelan to the tradition and culture from which it comes, suggesting that it can become devalued if separated from this. It is important that the scholarship of the music is retained at whatever level it is being played, and that the gamelan needs to be taught by people who are knowledgeable about this.

Sub-theme: Sense of occasion

The visual impact of the instruments, the way they are traditionally laid out, and the etiquette involved in playing emphasise that this music comes from elsewhere, somewhere unfamiliar and different, and all these features contribute to creating a real sense of occasion when coming to the gamelan for the first time. The 'genuine' and expensive looking instruments add to the sense of this being a different and 'special' experience.

Sub-theme: Etiquette and traditions

Traditional rules and rituals such as always taking ones shoes off to play and not stepping over the instruments are used in varying amounts by tutors. Most feel it is important to tell participants about this etiquette, and perhaps invite them to remove their shoes before going to the instruments, but they do not enforce this if they think it is not appropriate. For example, a traditional belief is that there is a connection going upwards from the instruments to the spirits (music is primarily for the spirits), and that by stepping over an instrument this connection is broken. The player who inadvertently does this should then apologise to the spirits. This belief it is suggested, should not be discussed with participants who are suffering from a psychotic illness, as they may find it disturbing.

Sub-theme: Values and possibilities of traditional music

The possibilities afforded by traditional compositions, forms and musical structures are a key feature for most tutors, and something that they feel sets the gamelan apart from other musical forms. It is frequently described as having an 'inherent discipline' which is very useful. The music is interesting with several layers of complexity. Its flexibility is much valued; playing music which retains something 'authentic' despite the adaptations made is the crucial aspect of this, which tutors feel is perceived in some way by participants. Traditional pieces can be quite simple, and easy to learn without prior musical experience. No notation is needed; the music can be very repetitive, with repeated cycles which, in addition to being relaxing, give people of different abilities more chance to learn it.

'one of the major keys with gamelan is that for every level of ability and every kind of musical ability there's something that someone can do. So someone who's just good at listening to the tune, knowing where they are and just hitting the gong, every eighth beat or when they get to that point in the tune. And that's equally as satisfying as playing the bonang penerus part and going, 'ding-ding-ding, ding-ding-ding' because it is equally as meaningful, despite the fact that they're not having to do lots or be quotes, clever. It's as important and as relevant to the overall piece...' (Tutor C)

Several tutors talk about how adaptable the musical structures are, so they might just use two-notes from a piece, (or a two-note piece) and then build up layers of complexity as the group progressed. Other aspects of the music are adapted to suit the particular abilities of the group, whilst still retaining the essence of the musical style. For example if a child found it too difficult to wait 16 or 32 beats to play the gong (as may be usual), they could play more frequently, whilst still keeping its use as a structural point of the piece.

^{&#}x27;Cos the way I do my [special needs] workshops is to build them up bit by bit by bit by bit, and depending on what speed people are going at. So if people are going slower I just do less, and say have a piece that is 2 notes, or a piece that's 4 notes or a piece that's 6 notes or a piece that's 8 notes and or, you know more bits around it. So I start building it up the same as I would a normal workshop and see where they're at, basically, and then go from there.' (Tutor C)

This flexibility, some tutors emphasise, gives participants the possibility of working at their own level, whilst still retaining the spirit of the traditional music, which is felt to be vital.

'And I think the fact that in gamelan, you know you don't have to use notation, the fact that the kind of the structure's there, it's set out. I kind of think of it as this open structure that then you can then fill in with, you know the higher levels you can be even more flexible and, you know, say if a young offender started doing a part that wasn't what I'd taught, or, but it fit, then you can work with that and actually it might have more of the spirit of gamelan than if you'd, ... than if you were too didactic about it.' (Tutor H)

Further flexibility is available through the roles the instruments and parts play in the music; whilst each part is important in the ensemble, they are not all as complex or difficult to play, so people can take on parts according to their skill and ability. They can try out different roles, both group and musical.

'And what really, what I find the most satisfying often, is groups where you can tell that there's a kid who's the one who the teacher doesn't think is that able, or is a little bit troublesome. But you kind of think, no I'm going to take the risk, I'm going to put him on gong. And he suddenly becomes the most responsible person in the room and is going 'I'm doing this! I'm doing it right, and I'm holding everything together' And just see them light up, with the realisation that they needn't be the one who's hopeless and getting lost, and they're actually doing something that's really important to the overall make-up of the piece.' (Tutor C)

The overall structure of traditional music requires participants to listen to and rely on each other in a different way to that of other music. Tutors might use the traditional roles of instruments in creative compositional work of the participants.

Yeh I think about using the instruments in traditional ways so for example I would expect if we were going to have a beat we'd probably play it on the kempli, ... And using the gongs to give a bit of structure to something you know, giving a beat on a significant point and um you know, like I said I remember there's one particular person that was really good with melodies, that would just make up lovely tunes, so I would say 'can you play that maybe on the tromping' cos that would sound really great, you know. That's the role the trompong has, to be lead melody and so to some extent thinking about the instruments how they're used fairly traditionally.' (Tutor A)

A further relevant aspect of traditional music frequently mentioned is that there is no conductor; participants need to connect to each other through listening which emphasises the group experience of playing.

'I think with gamelan you're more connected horizontally to other people. If you're in an orchestra, I don't think this is true of chamber music so much, but if you're in an orchestra, everyone's attached to the conductor, and you have all these lines going from all these musicians to the conductor and that holds it together. Whereas with gamelan all the lines are crossing between all the players and you're kind of held within this net of listening to each other, I think that's part of the appeal, you know that you're, you're supported and you're contributing to building up what's going on. So yeh, you're involved, you're contributing, but also you're being supported.' (Tutor C)

In contrast, a minority of tutors do not see traditional music as having any particular importance or use in composing and improvising; these are tutors who report having the least knowledge of the culture and experience of playing traditional gamelan music themselves.

7.6 Further themes

After combining themes to create the Key themes, two further sets of themes were identified from the material remaining. Whilst not relating as directly to the main research question they contained information which could nevertheless be relevant to the overall study and to more practical issues relating to the research subquestion of how gamelan can be used in music therapy practice. These themes were grouped into the headings Procedural themes and Tutor themes. These will now be described and shown in chart form.

7.6.1 Procedural themes (PT)

Procedural themes capture practical and factual information. They are about what the tutors actually do, how the work is set up and structured, and who they work with. These themes relate to the Key themes and provide more detail and contextual information about tutors' practice such as the range of clients groups worked with and session length. The Procedural themes will be referred to in the discussion of the Key themes in the next section of the chapter. They provide a range of ideas to consider for the use of gamelan in therapy contexts. The Procedural themes and information included within each is shown in the following table. The theme name and number is given in the shaded boxes.

PT1 Participants		PT2 Setting
Children:	Adult:	Special school
Learning disabilities	Learning disabilities	Community centre
Autism	Mental health problems	Arts centre
Emotionally &	Physical disabilities	Concert hall education
behaviourally disturbed	Hearing/visual impairment	centre
Deaf and severe	Recovering alcohol/drug	Prison
communication disorders	dependants	Young offender Institute
Visual impairment	Brain injuries	Probation hostel
'Looked after' children	Abused women	Secure hospital
	Prisoners/young offenders	Psychiatric hospital
	Families	

PT3 Frequency and type of session		PT4 Length			
One-off workshop		Two-hours			
Weekly class		Mainly 6-10 weeks, occasionally longer, up to 5			
		years			
Monthly session		1-2 years			
Intensive block		1 week or 7 working days			
PT5 Group size	PT5 Group size				
Occasional 1:1, gro	oups 6-15 preferred, de	pendent on participant's s	pecial needs		
PT6 Type of game	lan and tuning used				
Central Javanese		Sundanese	Balinese		
Slendro tuning:	Pelog tuning:	Familiar sound to	Angklung works well		
Harmonious,	Initially difficult	western ears	7 tone sets more		
Easy to use,	Clashes	Fits well with western	difficult		
quick success	More	instruments	Very noisy		
	interesting/variety		Damping important		
PT7 Set-up issues					
Good preparation needed					
	host organisation affect				
-		esistance, or can be negat	ive and disruptive		
PT8 Combining media					
Puppets, storyteller, artwork, guitar and songs, dance, classical musicians					
PT9 Musical structures and techniques					
Traditional music					
Different teaching styles, all teach pieces aurally, simple pieces or use elements and build up					
Importance of pulse and repeated cycles					
Traditional songs link to culture					
Creative music					
Begin with creating and exploring sounds, and damping techniques					
Improvisation: free/ with musical instructions/ traditional gamelan elements as starting					
point					
Instruments: used in unusual or traditional ways					
Composition: develop out of improvisation/ traditional style piece/accompany					
story/classical theme					
Tutor holds traditional ideas in head whilst facilitating creative work					
Musical exercises					
Learn musical concepts, e.g. pitch, rhythm					
Pair-work on bonangs, interlocking rhythms					

7.6.2 Tutor themes

The Tutor themes were derived from codes in which tutors talked about themselves, their musical experience, their views and attitudes to their work with special needs groups, and what their aims for the work are. Whilst they do not all relate directly to the research questions, they provide useful context for understanding the tutors' overall responses. The tutors' aims for their work relate to the perceived beneficial benefits of playing gamelan, as presented in several of the Key themes. The Tutor themes and the information contained within each are presented in the following table. The theme name and number is given in the shaded boxes.

Figure 12 Tutor Themes (TT)

TT1 Own experience o	TT1 Own experience of gamelan			
	melan, loved it, positive experience			
	e of music, sense of community, social aspects			
	c for self, gave up own instrument to play it			
	ssion from community music, IS community music			
TT2 Relevant training				
Gamelan playing	Large range of experience, from several years learning in			
	Indonesia, in the UK with Indonesian teachers, community			
	classes, to very little formal learning of gamelan, picked up few			
	pieces from short period of playing.			
Gamelan teaching	Most have no formal training to teach, shadow other tutors, share			
	ideas, need lot of playing experience to teach (some think)			
Community music	A few tutors trained in this, courses and experience			
Special needs	Most tutors have no training, feel are expected to work it out for			
	themselves. Some in-house training in music/arts organisation			
Other relevant training	Social work, introductory music therapy course, psychoanalytic			
5	concepts			
TT3 Aims of work				
Musical	Learn about Indonesian music, culture, learn pieces			
	Develop musicality and creativity			
	Have a musical experience, put on performance			
Educational	Develop ability to learn, engage with wider education			
	Develop 'key skills'			
	Develop interest in the arts			
	Learn transferable skills			
Well-being	Enjoyment, have positive experience			
5	Reduce isolation			
	Improve mental health			
	Increase motivation, self confidence			
	Give sense of achievement			
Social skills	Develop autonomy			
	Choice-making			
	Develop relationships (including parent-child)			
	Learn 'pro-social' behaviours			
Communication skills	Increase concentration			
	Self-expression			
	Listening skills			
	Ability to interact			
Team-work skills	Increase group awareness			
	Encourage participation			
Soncory awaranass				
Sensory awareness (Severe learning	Explore sensory aspects, sounds, sensory stimulation Make connections between sounds and movements			
disabilities)	Develop physical coordination			
นเริ่มมีแนะรา	Experience new challenges			
TT4 Political issues				
	es access to music making, sansa of musical deprivation of some			
Disabled people have less access to music making, sense of musical deprivation of some				
participants, e.g. young offenders. Gamelan playing contradicts negative attitudes to disabled making music				
	as something 'exotic and easy' for disabled as cannot play other			
things				

things Gamelan can contribute to the humanising of an institution

7.7 Discussion of relevance of Key themes to music therapy practice

I will now discuss the Key themes and consider what relevance they have to music therapy, relating this to the main research questions; what the playing of gamelan music has to offer the practice of music therapy and what the therapeutic benefits of playing have for people with special needs. I will be using the formulation of music therapy practice outlined in Chapter 1, (p.9) which is situated within the general approach to music therapy in the UK.

Using this formulation in addition to my own professional experience of working as a music therapist for over twenty-five years, I will consider how the themes are relevant to music therapy. A diagrammatic summary of the relevant aspects of each theme is included at the end of each section.

7.7.1 KT1: Accessibility

One of the key features of music therapy is that it uses instruments which are easily playable by people who have no musical experience or training. This usually includes a range tuned and un-tuned percussion instruments, xylophones and metallophones. Frequently, Orff percussion instruments with diatonic tuning are used, and sometimes orchestral percussion such as tympani or vibraphones. Occasionally an orchestral instrument such as a cello is offered; these are to be played in any way attempted by clients. Piano, keyboards and guitars are standard harmonic instruments, which again can be played in a 'non-learnt' way by clients who may be aware that they are not playing them 'properly' as they will not sound as they should.

The gamelan meets this music therapy requirement of a set of instruments which can be easily played by people with no musical experience, however, it is different in that the instruments all sound as they should on immediate playing; training is not required to produce a good sound. In this aspect they could be more accessible than other instruments. It is clear how to play most instruments, making it appropriate for children and adults with cognitive impairments, as well as for those lacking in confidence who may be easily discouraged if they feel they are 'failing' in their attempts too quickly. The tuning enables participants to be successful in their playing very quickly. Being able to make a rewarding sound that fits with other participants can encourage a client to continue their involvement in the playing.

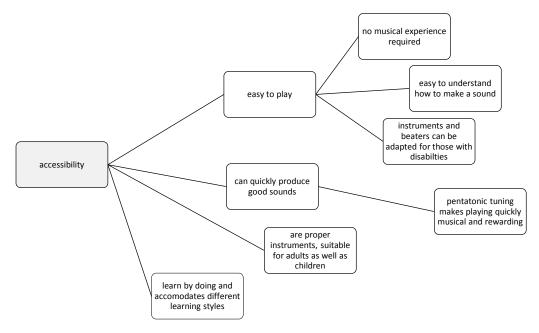
Of particular relevance here is the fact that in addition to being accessible, gamelan instruments are obviously 'proper' instruments. A criticism sometimes levelled at music therapists is that the instruments being offered are childish, and playing is 'like being back at school'. It can be difficult to find instruments which are simple to play but without such 'childish' connotations. Instruments also need to be satisfying to play, to produce a good sound. To address this problem there have been developments in the creation of new instruments specifically for music therapy. Various 'ethnic' percussion instruments are also used to add variety of sounds and timbres, and to offer non-childish instruments. Gamelan instruments offer an 'adult' experience of playing music which can be very simple, but which has a good quality and range of sounds and playing styles.

Although some participants were described by one tutor as finding sitting on the floor 'infantilising', this could be addressed either by telling participants about the context of gamelan – how it is played in Indonesia, and alternatively by raising instruments onto surfaces which allow them to be played whilst sitting in chairs, as is possible for those with physical disabilities.

The concept of 'learning by doing' cited by some tutors also relates to music therapy practice, in which clients are not usually taught instruments or pieces by using notation, if they are taught pieces at all. If, for example, songs are used, they are often created together in the music therapy or learnt by ear.

As music therapy clients may have difficulties with movements and grasping objects in their hands, the different ways that gamelan can be played and the adaptations to instruments and beaters described by tutors could be very useful in practice.

Figure 13 Summary: Accessibility



7.7.2 KT2: Encourages engagement

Difficulties with engagement can be a major aspect of music therapy casework. As a music therapist I may bring an autistic child to the music therapy room and then the work of the therapy is to find a way for us to communicate together, to engage in a shared activity through which therapeutic goals can be addressed. Just to touch an instrument and make a sound with it may take several sessions and be of huge significance for the child. Whilst an autistic child is just as capable of ignoring a set of 'exotic' gamelan instruments as they are a range of western percussion instruments, the visual, auditory and sensory appeal of the gamelan described by tutors could be very enticing and encourage clients to engage with the gamelan, and through this, with the therapy and therapist. The unfamiliarity of the gamelan could invoke curiosity and allow clients to overcome their usual inhibitions or reluctance to trying out new things; and they may also experience the real sense of excitement described by tutors, in their initial sessions. It was interesting to note the experience of one tutor who worked with autistic children; there was an expectation from teaching staff that the children would find the instruments and sounds over stimulating, but in fact they generally did not and readily engaged.

Improvisation is a key approach in UK music therapy; clients may be asked to explore the instruments and find a way to play together as a group, or to improvise freely on a theme. The harmonies of the pentatonic scale of the gamelan are very usable within this approach, as the sounds will generally fit together, and create a sense of cohesion. This effect can be created with western instruments by rearranging the bars on a metallophone to a pentatonic scale or telling clients to just play the black notes on the piano, but it does not occur naturally, as with the gamelan.

Conversely, the gamelan scales could also be a limiting factor in music therapy, when harmony is not only what is wanted. Most gamelan tutors aimed to create a sonorous musical sound with the gamelan, which may not be the focus in a music therapy session. A minor key, dissonance and the resolving of this can be very important and expressive; it is difficult with a 5-note pentatonic scale to achieve the full range of expressive melodic material which may be required to express the emotional world of a client or the dynamics of the relationship. The different sound qualities of the instruments, including the drums could produce some dissonance but this may not be sufficient. It is interesting to note the comments of the tutor who specifically chose the pelog tuning (which has the capacity for dissonance) when she wanted there to be more 'edge' to the music. Using both tunings of central Javanese gamelan in music therapy could give more range, as could using them both simultaneously, which would greatly expand the melodic and harmonic range and produce some dissonance.

Many tutors talked of the positive effect on participants of achieving a 'beautiful sound' when playing the instruments, and similarly many clients of music therapy would also benefit from this experience. It can offer aural feed-back and give clients a sense of achievement lacking in other areas of their lives. It could enable them, to be 'good' at something, as one tutor described.

Several gamelan tutors talked of the 'level playing field' being a key aspect in encouraging engagement; the effect of no-one being more experienced on the instruments than anyone else. Music therapy sessions also offer this experience, although sometimes a client may be a musician. The finding that gamelan sessions can encourage prison officers to play with prisoners or carers with disabled people is relevant to music therapy. Music therapy clients may have a carer or member of staff with them in the session to help facilitate their playing, or to be available for medical care if needed. If they are to participate in the sessions, starting from the same place as their clients could be very powerful for the clients. They would share the experience closely, and the client may be able to experience being as or even more able than their accompanying staff member. This could be very empowering for the client, and allow the staff member to see the client in a new light, as being 'able' rather than only disabled. Whilst this may not be the core focus of the music therapy session, it could have an effect of the staff-client relationship that has implications for outside the therapy room. Gamelan playing could be very appropriate within a community music therapy approach aimed at developing the relationships between able and disabled people. Although this experience may be achieved with other musical ensembles, the 'level-playing field' effect makes it very possible with the gamelan.

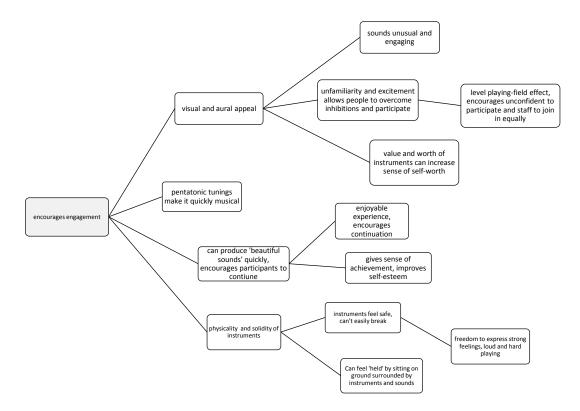
The themes of value and worth, tutors equating the value of the instruments to the value in which the participants feel they are held, has some interesting possibilities. The examples given by tutors of prisoners and of a deprived boy being overwhelmed that they would be given such valuable instruments to play show how this experience of gamelan challenged their perceptions of self-worth. This experience could also be relevant to some music therapy clients, in particular, clients who are used to being given equipment or experiences of poor quality, or who are considered to be unable to tell the difference. If someone is shown that they are considered to be not worth much, by the way they are treated, it can then lead them to act as if they are not worth much; a lack of expectation can be selffulfilling. Therefore being offered a musical experience on instruments which look amazing, hand-crafted and expensive, could be very affirming to clients not used to this. In a further development of this concept, two tutors who worked with adults with severe learning disabilities talked of how institutionalised and devalued the gamelan instruments themselves became in one setting. They were viewed as instruments only for the learning disabled and were treated with a lack of care and respect and became increasingly damaged. This was felt by the tutors to reflect the ways the clients were thought about too.

The physicality and solidity of the instruments would be relevant for many music therapy clients. In particular, those who would benefit from being able to strike instruments with some force, whether as an outlet for strong feelings or because they are without the fine motor control required to control their playing. Knowing that they can play quite strongly and not break the instruments could be important in giving them the freedom to express themselves.

The concept of containment (Bion, 1962) is part of many music therapy approaches. The therapist's task is to be able to contain the various emotions and projections of the client, to digest them and offer them back musically in a form that can be received. Whilst this containment is largely found within the relationship between therapist and client, tutors' ideas about the containing and holding aspects of the instruments, being able to 'huddle down' in them have relevance. Clients could feel held, both by the sounds and by the physical space that they are in. These physical aspects of containment can be of importance to some clients, where a sense of safety is needed before they can really engage. In a group setting, the marking out of a personal space with physical boundaries may be important to some clients.

Lastly, enjoyment, cited by tutors as a major factor for encouraging people in their gamelan playing could also be important for music therapy, and motivate clients to keep participating, and to attend sessions. Whilst this may not be a main aim of the therapy it will have a role to play in the client's experience of their therapy.

Figure 14 Summary: Encourages engagement



7.7.3 KT3: Offers many group-work possibilities

Group work is widely practised in music therapy; there are different approaches to this, many informed by psychodynamic theory (Davies and Richards, 2002). As gamelan is inherently a group activity it appears to offer the basic tools for group music therapy, facilitated by a music therapist with therapeutic intent. Gamelan could be used within a group therapy approach which emphasises being together as a way of learning about oneself and others. The gamelan tutors' ideas that playing can be 'community generative' and that it can develop a 'group culture' are both very relevant here. All tutors talk of ways that the gamelan could be an instant group activity. The nature of tutors' work is to create music together; a traditional piece or a group improvisation, mainly for education and aesthetic purposes. In music therapy, the making of group music may only serve the purpose of the therapeutic aims, therefore learning a pre-composed piece of music together is less likely to be undertaken. However, if the therapy aims match the outcomes which tutors claim result from learning a traditional gamelan piece (whether in original or simplified form) then this could be a meaningful activity, in addition to the more usual free improvisation music therapy approach.

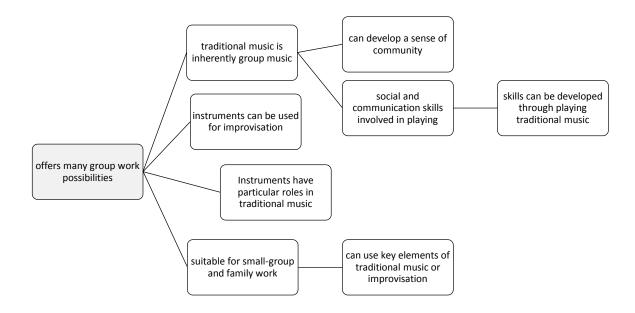
Tutors who talked most about the group nature of the music being a tool for the development of other life skills tended to be those working in prison or secure settings. Most of these tutors work for an organisation which has a clear philosophy for their work which focusses on the use of gamelan playing to develop communication, life and work skills. The roles people take in groups is a key feature of group therapy (Foulkes, 1975); noticing how one behaves in groups can be a way for participants to learn about themselves and how they relate to others. This is talked of by some tutors as being something that can be made use of in workshops; choosing who plays what instruments and the roles that instruments have in the overall music or traditional piece. These ideas could be taken further by a music therapist. In music therapy an unconfident child may be given the role of leading an improvisation by giving a drum beat; this could be replicated in gamelan playing by being the drum or kempli (beat-giving gong pot) player. Other group roles could be experimented with through the playing of different instruments which serve different functions in the music, such as playing the large

gong at the end of each cycle; the player holds the structure for the group with this one note.

The development of social skills and communication skills are two of the most frequent aims in music therapy work with both children and adults. Many tutors noted these as outcomes of gamelan playing, even if they were not in their aims. What is interesting from a music therapy perspective is that these frequently occurred through the playing of traditional music, or music structured with traditional elements. As discussed earlier, whereas in music therapy improvisation or simple musical exercises or games might be used to address these aims, the playing of traditional gamelan music seems also to offer these possibilities. It could be a different way to address these therapeutic aims.

A recent development in music therapy is family work (Oldfield and Flowers, 2008). This can take place in various settings; in child and family psychiatry, with young children who have learning disabilities and their parents and/or siblings, with single families or groups of families. A few gamelan tutors discussed their work with families; the running of open gamelan workshops during family visit days in prisons as an activity for prisoners to interact with their young children is one example. Here the aim is to facilitate and develop a relationship, to give the parent and child a way to be together, rather than just to have a satisfying musical experience. Some tutors run 'family days' in orchestral community settings, again as a way for families to have an enjoyable activity together. These indicate the potential for gamelan playing to be used in family music therapy.

Figure 15 Summary: Offers many group work possibilities



7.7.4 KT4: Therapeutic effects

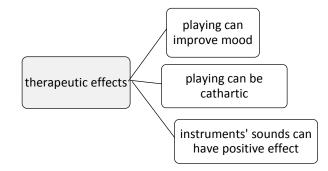
It was evident from the interviews that tutors were using the term 'therapeutic' in several different ways; definitions were not given. Some use the word themselves to describe aspects of their work whilst others responded to prompts on the topic. The way tutors use the term therapeutic often differs to how a music therapist might use it, in that many of the ideas about therapeutic benefits could be grouped into a theme about general 'well-being' rather than relating to specific therapeutic goals. These ideas could be further explored to analyse what about the experience made it beneficial; for example the idea that playing gamelan raised people's moods, and they felt better afterwards, could be attributed to having experienced feeling connected to other people, to enjoying the sounds of the music or the effects of vibrations, or to feeling a sense of achievement in having been able to learn something new. Finding our more about how these benefits are achieved would enable them to be used purposefully in music therapy. The cathartic effect of 'getting out aggression' is described as therapeutic by some tutors. The expression of aggressive feelings may also be an aim or outcome in music therapy. Whereas gamelan tutors do not describe exploring this effect further with participants, in a

music therapy setting this cathartic experience could be explored with the participants and would be seen as part of the therapeutic process. It is clear from the interview analysis that in general tutors do not explore the meaning of participants' actions or music; this is a point at which a music therapy approach diverges from a music tutor's work.

Two tutors who work with very disabled participants in individual or small group settings talk of the potential for a music therapist to take their work further. They appear to be aware of both the therapeutic potential of playing the instruments for their participants and of their own limitations as gamelan tutors. Work with severe mental and physical disabilities would be an area for exploration by music therapists, who are trained to work with severe disability.

A key difference between musical activities which have therapeutic benefits, as described by the gamelan tutors and music therapy is the approach and intent of the tutor or therapist; how they respond to the participants and understand or give meaning to their actions. A music therapist may respond to participants and use activities different ways to a gamelan tutor, and vice versa.

Figure 16 Summary: Therapeutic effects

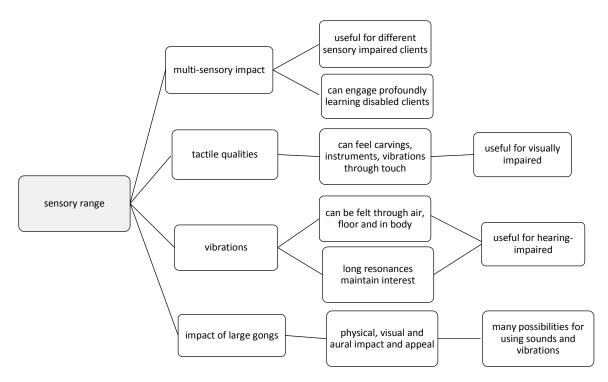


7.7.5 KT5: Sensory range

The sensory range of the gamelan is a distinctive feature important to many tutors. This range has many possible applications in music therapy; the quality of the sounds, vibrations and length of resonances would be useful in working with people who have specific difficulties, such as the hearing and visually impaired and those with severe learning disabilities. The vibrations of the sounds and instruments, and how these are experienced through the body are a key feature of some tutors' work. In music therapy there has been some work on designing instruments which give a deep enough resonance to be experienced by children with hearing impairments, for example the low 'tone-bars' used by Claus Bang (www.clausbang.com). The gamelan instruments appear to also have a lot of potential for this work; the size of the gongs creates very deep resonances. One tutor described a child who did not want to play the gong, but wanted to feel the vibrations with his hand when the staff member played it.

The multi-sensory aspects of the gamelan, the aural, visual and tactile features, make it a very useful set of instruments with which to engage and connect with clients who find other music less accessible. The differing sensory stimulations could be ways in to engage people who are not easily engaged. One tutor talks of a blind, learning disabled child who only wanted to trace the carvings of the instruments. He did this for some time, and then indicated he wanted to leave, not playing any instruments. A music therapist could use this initial interest and tactile engagement with the instruments to develop a relationship with the client, and lead them into a musical interaction through which therapeutic aims could be addressed. There is the potential for individual music therapy work with clients who have profound and multiple learning disabilities (PMLD), as discussed earlier. Instruments which have specific sensory qualities, such as the hanging gongs, and the kenong pots (large, horizontally mounted gong pots) could be used for sensory stimulation. For example, a tutor described how the kenong pot was touched, hugged and played with by a PMLD participant. The gamelan instruments offer more possibilities for music therapy this client group which could be explored further.

Figure 17 Summary: Sensory range



7.7.6 KT6: Cultural heritage

The striking visual aspect of the gamelan immediately tells one that it is from 'elsewhere', that it is foreign; this can have both positive and negative effects. As already discussed, the novelty can enable people to overcome initial reluctance or resistance to playing. It can create excitement, and stimulate discussion about where it is from, what the culture is, and how the music is used. This positive effect would also be helpful in music therapy. The foreignness of the gamelan can also be a barrier; one tutor talks of the suspicion with which it was greeted by people who were uncomfortable with something outside their sphere of experience. It was viewed negatively as something too foreign, perceived to be from a religious culture which they viewed negatively, and they did not want to engage with it. It would be important in music therapy to be sensitive to the perceived cultural associations of the gamelan by the clients being worked with, who may also have differing cultural backgrounds.

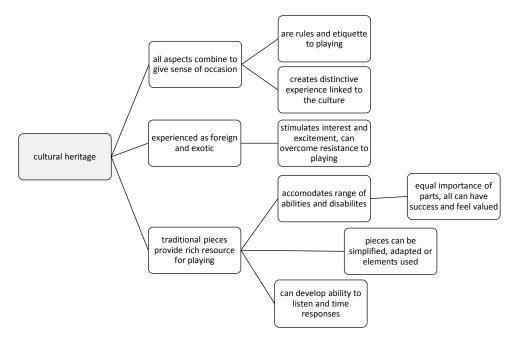
The 'sense of occasion', afforded by both the instruments and the etiquette or 'rules' of playing could be an aspect which music therapy clients would respond to. The formal layout of the instruments and rituals such as taking shoes off before playing and rules about how to move around the instruments could appeal, for example, to clients on the autistic spectrum who require set structures. Several tutors talk of these aspects as creating a special atmosphere in sessions. This has parallels to the 'rituals' of group music therapy, such as the chairs being laid out in the same way each week, the keeping of an empty chair when someone is absent, and the use of the same opening and closing music each week, such as hello and goodbye songs. These all convey a sense that this is not just a random gathering of people and instruments; this is a session where some work is going to take place, where something is being taken seriously.

The rituals are used flexibly, as described by tutors; not all insist that participants take their shoes off, if this would cause them distress. One tutor relates that although she does not usually insist that participants take their shoes off, for one group of teenagers she did. Having discussed the reasons for taking shoes off, she felt that the few teenagers who refused were communicating disrespect and an unwillingness to take the work seriously; therefore she did not allow them to participate. This is an example of someone thinking about the meaning of the group behaviour and responding to this, in a similar way to that of a music therapist. The way participants respond to the rituals and rules would be considered relevant within music therapy sessions.

Traditional pieces offer a huge range of resources for playing, as described in the discussion of Key themes two and three. A music therapy session with gamelan could involve playing a traditional piece, or using elements of traditional music to play a piece of music together, with therapeutic intentions. The equality of parts and flexibility of levels of difficulty make it very usable with groups with different levels of disability. Playing traditional music requires various skills which might need to be developed in the therapy of these clients, such as listening to each other as necessitated by the lack of conductor; of being able to be a part of a group and to consider others.

In addition to this however, an important aspect of this theme is about retaining something of the culture of the music, that this is experienced as different to other music. Tutors describe there being something 'special' and distinctive about gamelan music; some feel that not only should the tutor communicate this to participants, they need to be experienced in the music themselves in order to do this. It would take further research to understand the different outcomes of playing led by a tutor who knows little about the gamelan and uses it as a musical resource, and one who has considerable personal experience of playing and who tries to convey the culture through the music. The relevance of this aspect to music therapy is difficult to assess; using traditional gamelan pieces may offer the opportunity to convey the culture of the music, although the effect of this is not yet known. It is however likely that a therapist who is experienced and familiar with the music would be able to use it more freely and flexibly, and have more musical ideas based on traditional structures ready to use spontaneously.

Figure 18 Summary: Cultural heritage



7.7 Summary

The interviews and interview analysis have shown in detail how gamelan tutors think about their work with people who have a range of additional or special needs. The data analysis has demonstrated what it is about the gamelan that tutors consider makes it a useful and relevant musical practice for these participants, how tutors use it and what benefits they think can be gained from playing. Six Key themes with sub-themes have been identified which relate to the research question of what is therapeutic about gamelan playing. Whilst the benefits of gamelan playing identified ranged from musical and educational to general well-being, those that related to their therapeutic potential have been focussed on. The Key themes have then been considered for their potential relevance and application to music therapy practice. This further consideration is discussed by theme and the most relevant aspects of each theme have been represented graphically. Two further sets of themes have been identified which provide practical information and context; these have been grouped together under the headings of Procedural themes and Tutor themes

The next stage of the study is to take the Key themes as well as relevant aspects of the Procedural and Tutor themes and use them to set up and run a series of music therapy sessions using gamelan. A music therapy project was set up for this purpose and is described in the following chapter.

Chapter 8. Music Therapy Project: Exploration of themes in a clinical setting

The next stage of this study addresses more directly the research sub-question of how the benefits of gamelan playing can be used by music therapists in clinical work. Using the themes identified from the semi-structured interview analysis, I set up and ran a music therapy project consisting of short series of music therapy sessions using gamelan instruments. The purpose of this project was to look at just one possible clinical application for using gamelan in music therapy, to apply and consider the themes and their relevance to music therapy. By carrying out a piece of clinical work at this stage, I would generate more information to contribute to the overarching data analysis for the development of guidelines and principles for the use of gamelan in music therapy, to be undertaken in the final stage of the study, described in the following chapter. In addition to refining ideas for the guidelines drawn from the interview analysis, applying it in a clinical setting could potentially suggest some new ideas for guidelines.

Methodological considerations

As a researcher I was satisfied that I had identified the themes from the interview analysis relating to the potential therapeutic benefits of gamelan playing for people with special needs and for special populations. However, these themes were generated from investigating the work of music tutors rather than music therapists. As a music therapist I was very interested in putting some of the findings into practice, to explore them further and bring a practical perspective to the theoretical discussion of the relevance of the themes to music therapy practice. Whilst I am aware that my enthusiasm for trying out some of the ideas was influencing my decision to incorporate a music therapy project at this stage, I believe that it provides a further level of sophistication to the PhD study by bringing in a clinical perspective to the findings.

Therefore, for this part of the study I took on the role of practitioner-researcher to investigate my own practice using gamelan in music therapy. An advantage of the practitioner-researcher role is that the researcher will have 'a pre-existing knowledge and experience base about the situation and the people involved' (Robson, 2002, p.447). I would be using my experience and knowledge as a music therapy practitioner, or clinician, to provide another layer of detail to the thematic analysis. In doing this, I moved to and fro along the continuum between the roles of researcher and clinician. On the researcher end of the continuum, I used the three sets of themes generated from the interview analysis to set up and plan a course of music therapy. On the practitioner end of the continuum I ran the music therapy sessions. I moved back towards the researcher role after completion of the clinical work, and used the data produced to evaluate the original themes. Methodologically, this was a further stage of reflecting on, evaluating and analysing the relevance of the themes to music therapy practice, as undertaken in chapter 7.7. (p.111) This would strengthen the results of the thematic analysis and produce more data to take into the overall data synthesis, and specifically, to use in the development of guidelines for gamelan use in music therapy.

The data produced from the clinical work consisted of session notes, written up as a descriptive clinical case study report, and a review of the therapeutic outcomes for each of the children taking part. This was compiled using my clinical judgement as a music therapist, and the views of the teaching assistants involved, gathered through brief, final interviews with each. Video recordings of the sessions were used to facilitate clinical reflection of the work and in supervision sessions with the clinical supervisor. They did not form part of the review of the themes or part of the overall data analysis and synthesis.

The data produced from the clinical work was considered only in relation to the three sets of themes already produced, as a further stage of synthesis. It was not subjected to a fresh thematic analysis or a case-study analysis as this would be beyond the scope and focus of the study. However, it is recognised that the school project provided a rich source of material which could usefully be analysed in a range of ways in further research.

In this chapter I will first describe how the music therapy project was set up and then discuss how the Procedural and tutor themes relate to the proposed music therapy work. I will then present the setting, participants and a summarised case study. Following this I will evaluate the relevance of the Key themes to the music therapy work. The Key, Procedural and Tutor themes will be referred to throughout the discussions using their initials, as given on the theme charts in the previous chapter (Ch.7.5.6).

8.1 Selection of client group and setting.

As gamelan is fundamentally group music, and the majority of the interviewees worked with groups, I decided to run group music therapy sessions rather than work 1:1 with individuals. Groups are widely worked with in music therapy, and working with a group would offer the most opportunities for relating the interview themes to therapy practice. A further issue was whether a group would come to the gamelan or the gamelan would go to the group. This would be dependent on the client group selected. A possible external location for the gamelan group was a music therapy clinic at a university training centre for music therapy, managed by the author. Alternatively, it could take place in the client setting if a suitable space could be found.

Various client groups were considered for the project, taking as a starting point the participant groups worked with successfully by gamelan tutors, and considering whether there would be people in these groups who had needs which could be addressed through music therapy. Client groups who already had had access to a music therapy service were also looked at.

Adults with learning disabilities were considered a possible group to work with; gamelan tutors reported on successful workshops with these participants and there is an NHS music therapy service in the local area. Most adults live in a range of residential community settings and undertake a wide range of daily activities, therefore creating a new music therapy group would entail gathering referrals from different agencies. A day-service setting which could host a gamelan, or where there were likely to be sufficient referrals for a whole group could not be identified, therefore participants would need to travel from a range of different locations to the music therapy clinic, if this were to host the gamelan. This would involve considerable liaison with different agencies, homes and clients, and travel costs for which there was no budget. This was felt to be too complex and costly for the purposes and time-scale of this research study, although it would be very interesting to pursue in the future. A small number of tutors worked with adults who have mental health difficulties. There were some logistical difficulties with running gamelan music therapy groups in the local adult mental health service, where there is also a music therapy service. I was aware that this service was already running as many music therapy groups as demand required, and it would have been difficult to set up an additional group at this time.

Running a music therapy group in a prison was felt to be too complex to set up and use for research; there would be many security procedures to go through and consent to film would be unlikely to be given. More importantly, music therapy is not well established in most prisons, where there is no context or referral system for this. In this setting I would be likely to be introducing the idea of music therapy, in addition to the idea of using gamelan for this purpose, which may have been too large a task in the time-frame. Gamelan tutors working in prisons see one of the key strengths of the workshops to be that they are not offering therapy; they are offering music workshops, through which other skills can be learnt. This is very different to bringing a gamelan in to a prison and offering prisoners music therapy.

Many gamelan tutors describe working with children who have a range of learning disabilities, autism and sensory impairments. These children usually attend a Special School for children with mild, moderate or profound learning disabilities and music therapy is often available in these schools. Situating the gamelan music therapy project in such a school would be likely to provide enough children with needs that could be addressed through music therapy to form a group, and potentially a suitable room in which to undertake the work. Therefore, it was decided that this would be the most suitable setting for the project.

8.2 School project set-up

In setting up the project, the Key, Procedural and Tutor themes were referred to and where appropriate, were used to inform how the sessions were constructed. Once the project had been set up, the Procedural and Tutor themes were reviewed to see how relevant they were for music therapy, which elements matched and which were different. This review is outlined at the end of the description of the setting-up process. The Key themes were reviewed on completion of the music therapy project.

8.2.1 Choice of School

There are two special schools in the local area, one in the city and one a few miles outside; both have a primary and secondary age groups and take children from a large geographical area. I had previously been in contact with the city school, having run one-off gamelan workshops for two classes as a part of larger musical event involving two other main-stream schools (Proms in the Playground, mentioned in the Introduction to this study). I also had a good professional relationship with the two music therapists who worked at the school. Therefore I decided to approach this school first to see if they would be interested in hosting the project.

8.2.2 Gaining agreement of school

The initial contact was made with the music therapists; it was important to gain their agreement for the project before proceeding any further. I was aware that care would need to be taken not to infringe on their clinical practice, and to find a way to work together with their music therapy referral system, without causing them any difficulties. They were very enthusiastic about the project and suggested I approach the Head teacher.

The Head teacher responded positively to an email in which I briefly described the project, and she passed this on to the music therapists and asked them to take it forward with me. A meeting was then arranged with the lead music therapist and the 'Access to Learning' coordinator who organises all music therapy referrals for the school. This person also has the role of liaison with any research students who come to the school, and it was decided that she would be my main contact for the project.

8.2.3 Relationship to existing music therapy provision

It was agreed that the research project would be separate to the usual music therapy service of the school. This was for several reasons; most music therapy offered in the school is individual work, generally lasting for the whole school year. There is considerable demand on the service, and referrals are prioritised, with several eligible children not receiving it. The gamelan project would be short-term group therapy; therefore if children were taken from the music therapy waiting list, they would be getting a very different and shorter period of therapy than usual. As such, parents could feel that their children were being offered something less than 'proper' music therapy, and that taking part might mean their child was less likely to receive music therapy as usual later on. Also, although I would be working as an experienced music therapist and conducting music therapy, the use of gamelan for clinical music therapy is experimental; therefore I felt it would not be right to offer it in place of the usual music therapy. The gamelan project would be presented as an additional therapy activity, and would not take any children from the music therapy waiting list, or those who were currently receiving music therapy.

8.2.4 Selection of group participants

The selection of students for the group was undertaken through discussion with the Access to Learning coordinator. It was necessary to fit in with usual school procedures to a certain extent; the coordinator felt it would be very difficult to take individual children out of several different classes to form a group on an on-going basis. She suggested that working with an existing group would be much easier to manage, and the session could then take place during a normal lesson time. I described some of the benefits of group gamelan playing as identified from the previous stages of this research. Based on this the coordinator selected a group of children who she felt had not yet 'gelled' as a class, and who would benefit from something that could help them to work together better as a group and be more tolerant of each other. The suggested group was an 'Ability Group' formed of children from years 7 and 8 (Key Stage 3) who had similar ability levels and who undertook subject lessons together. I was told that the Teaching Assistants for this group would attend the gamelan sessions with them, in line with usual school policy.

8.2.5 Staff Liaison

The Access to Learning coordinator then wrote to all relevant staff about the project and gained their agreement for it to go ahead. She selected a lesson slot (R.E.) that could be replaced with the gamelan session, to which the R.E. teacher agreed. I tried to have as much direct contact with staff as possible, in order to ensure the successful running of the group (Procedural theme 7) and arranged to attend a Key Stage 3 (KS3) weekly briefing meeting to tell the teachers about the project. This was received with some interest and enthusiasm, one teacher having participated in a gamelan session during the previous musical event described earlier. I showed pictures of the instruments and answered questions about the project. No concerns were raised. The assistant head teacher for KS3 then offered to take me immediately into his English lesson with the Ability Class I would be working with, to introduce me to the children. Although unplanned, this was a useful activity; I was introduced to the students by someone in a position of authority who they knew well, which made for a very safe first meeting with them. I briefly told them that I would be doing some music therapy with them later in the term but that it would be different to what was in the school already as we would be using gamelan music from Bali, and passed around pictures of the instruments for them to see. The Access to Learning coordinator, who was also present, explained this would take place during R.E. lessons; this caused a little concern to one student who said it was her favourite lesson as they did quizzes in it. It was explained that this would only be for a few weeks and then R.E. lessons would resume, which appeared to satisfy her.

8.2.6 Ethical considerations

Ethical approval for this part of the study was applied for and granted by the University Ethics panel, as shown in appendix B. Three sets of information and consent forms were produced; for the children, for their parents/carers, and for the teachers. The sheets for the children were written in very simple language and included pictures. The draft consent forms were shown to the Access to Learning coordinator first, who suggested changes to the parents' forms, based on her knowledge of the parents involved. This included simplifying the language and changing the order of information so that the most relevant information came first, and the more 'official' points later, as, she suggested, these were unlikely to be read. The sets of forms are shown in appendix J. Full consent was obtained for the use of material from the school project in the publication of this study, including the use of video and photos. In order to make it clear that this activity was separate to the usual music therapy provision, and that it was part of a research project, I gave it the name 'The Gamelan Therapy Project'. As far as I am aware there is no practice called 'gamelan therapy' so this would not conflict with an existing discipline.

The parents were told that the project aimed to help their child in the development of communication, social and emotional skills and that they may find it an interesting and enjoyable experience. They were assured of the anonymity of the project and were asked for consent to video the sessions in addition to the publication and presentation of the work.

The pupil information sheet described the gamelan project as an activity in which they could learn about listening to others, communicating and expressing themselves, find out about a new kind of music and that it might be fun.

8.2.6.1 Gaining consents

Parent/carer consent

Information sheets and consent forms were sent home in a sealed envelope with each pupil, along with a covering letter from the Access to Learning coordinator stating that the school had approved the project. Parents were asked to return the signed forms to the school via their children. The process of getting all the forms back took about four weeks; I phoned the homes of those who did not return forms to see if there were any problems; some just needed reminding and some had not received them. These families were sent another set of forms. During these phone calls I was often able to give the parents more information about the project and answer their questions. They all sounded positive about it and were keen for their child to be involved. One parent was not literate so the Access to Learning coordinator gained her verbal consent through a phone call, which was recorded on the form. All forms were received before the group began.

Pupil consent:

To gain the consent of the pupils, I visited their classrooms at the end of the day during free time, when they were mainly playing on computers. I read through the information sheet and consent form with them in small groups and individually, and asked them to sign if they agreed to take part. I also made it clear that I had already told their parents about the project, had asked for parents to give permission for their child to take part, and suggested that the pupils talk to their parents or to the Access to Learning coordinator if they had any more questions about it. Most pupils readily agreed verbally to participate and those that were able signed the consent form. Some pupils said their parents had already told them about it. One pupil who is blind and autistic gave her verbal consent to a member of staff, who recorded it on the form. All the children's consent forms were witnessed and counter-signed by a member of staff.

An issue which arose from the pupil consent form was that, in line with usual ethical policy, the pupils were told they could withdraw from the project if they no longer wanted to take part. The Access to Learning Coordinator explained to me later that this contradicted school policy which was that once a child has started an activity they are expected to continue with it until the end. We agreed that the gamelan therapy would be presented as a class activity, but the children could withdraw from the research aspects of being videoed and written about. If this happened, they would be positioned with their back to the camera, and have their face blurred in any showing of the video, and they would not be individually written about.

Staff consent:

The class teaching assistants (TAs) were given the information sheets and consent forms at a meeting with them before the sessions began. One TA was given them retrospectively after her first session, as it had not been known that she would be attending the group. They all agreed to participate in the research and signed the consent forms.

8.2.7 Practical set-up

After much discussion and searching, a suitable room for the sessions was agreed on, which was large enough for the group and instruments to be placed in, and which had an attached walk-in cupboard for instrument storage during the week. It was also located in an area where other classes would not be disturbed by the sounds and was available both before and after the session time to allow for setting up and packing away. A small video camera on a tall tripod was placed at the side of the room, where it could film the whole group space. A barrier of chairs was placed in front of it to protect it from being knocked over and to minimise access to it by the children. Sound was recorded through the camera. It proved difficult to place the camera in a position where both the sound recorded well and the room could be clearly viewed; the reverberations of the deeper instruments caused much sound distortion. After two sessions the most effective place for the camera was finalised. The sessions were also audio recorded using a small digital recorder, placed to be as unobtrusive as possible.

8.2.7.1 The instruments

The set of gamelan instruments available for the project was a Balinese Angklung. A full set consists of about twenty individual instruments. I felt this would be too large for the group size and room, and would offer too much choice for the participants. Therefore I selected twelve instruments to use for the group, using the Key Themes (KT) to inform this choice. The criteria used for selection were: to achieve the widest possible sensory range, (KT5), to offer a pleasant sounding initial experience by facilitating harmony in the playing of melody instruments (KT2), to accommodate different playing styles and physical abilities (KT1), to give a range of timbre, melodic and percussive sounds (KT2 & KT5), and to offer a range of instruments sizes(KT1). The instruments were also selected so that the playing of traditional music would be possible, (KT6).

As described in Chapter 2, a feature of Balinese instruments is that they are constructed in pairs of the same instrument, one being tuned slightly higher than the other. The effect when each pair is played together is of a 'beating' wave sound. Therefore I chose two pairs of melody instruments for the group, the deepest sounding instruments, (the Jegogan), for which this effect is most prominent, and a pair one octave higher. This relates to both sensory range (KT 5), and therapeutic effects (KT4), in which tutors suggested there may be something therapeutic about these sounds. The rest of the instruments were used singly, which although not authentic, was necessary within the size limitations of the group and I felt did not adversely affect the overall sound.

8.2.7.2 Layout

Before each session I moved all tables and chairs to the side of the classroom to create an open, carpeted space for the gamelan. In traditional gamelan playing, instruments would be set out in rows in a specific order, with paired instruments adjacent to each other. All the players would be facing the same way. In music therapy group sessions the instruments or chairs are usually arranged in a circle. A circular layout was also used by a gamelan tutor as a way to encourage communication and interaction between participants, (KT3). As these were music therapy aims too, I decided to arrange the instruments in a circle, with elements of traditional order; paired instruments were placed adjacent to each other, and others were grouped according to type. Each instrument had a cover. **Photo 12 Layout of instruments in room**



Behind each instrument I placed a red cushion. As the instruments are played whilst sitting on the floor, cushions are often used for comfort, however I felt this would also offer useful structure for the children; they would know where exactly to sit for each instrument. I also made some adaptations (KT1) replacing all the wooden mallets with softer percussion beaters. As well as being safer to use (the wooden mallets have a sharp pointed end) I hoped these would make the need for damping the notes, a more complex technique, less necessary and thereby improve the sounds created.

8.2.7.3 Session length and duration

Eight weekly sessions were planned, four before and four after half-term (a oneweek break). The session length was dictated by the school timetable; it had to fit into a lesson length of 45 minutes. It took some time for the children to arrive at the gamelan room from their form rooms where they had been in afternoon registration, and then to line up together outside before being allowed in to the room (school procedure). Therefore the actual session time was often shorter. The usual session length for a music therapy group with these clients would be between 30-45 minutes, therefore this matched the time available. The session took place after the lunch break.

8.2.7.4 Session recording

In addition to audio and video recording, immediately after each session I wrote a reflective log containing my initial impressions, thoughts and feelings about that session and any notable points about the pupils. Later, I wrote a more detailed account of the session, whilst viewing the video recording, together with some further reflections and thoughts. This informed my approach for the following session. I also had weekly clinical supervision, as is usual in music therapy practice, within which I presented the session including video extracts to my supervisor, and we thought about it together. This furthered my understanding of the work and how to proceed with it.

8.2.8 Role of the teaching assistants.

The class has two regular teaching assistants (TAs) assigned to it who accompany the pupils in most lessons. It was expected by the school that they would also attend the gamelan therapy sessions to assist with the pupils when needed. A meeting was arranged with the assistants prior to the first session, in which I explained the purpose of the group and how I would run it, and the roles they could take within it. I asked them to take part in the playing, to follow my lead in managing the pupils, and to assist the pupils in their playing if they need help or taking out of the room.

As the two members of staff who had the most consistent daily contact with the pupils, the TAs were most familiar with the pupils and likely to have much information about them; I asked what they thought their needs were as a group and individually, and what they thought they could benefit from help with. The TAs described the class as a 'difficult group' who in class tended to get 'off task', carried away and become over-excited. As a group they needed help with working together and helping each other out. They felt that all the children needed help with communication difficulties (as described in the children's profiles below, (p.142). They advised that the children would need some structure in the sessions, and to know who was in charge. As a new person, they would not know what to

make of me initially and would be testing out boundaries. It was agreed I would meet with one of the TAs every week before the group for a 10 minute handover of any information about the children or for feedback from the previous week's session.

8.2.9 School music therapists

Prior to the group starting I met again with the two school music therapists to update them about the project and to ask for any advice they had about working with these children, based on their experience with them. The music therapists mainly undertake individual sessions although one group was currently being run with a class of the older teenagers. They emphasised the importance of providing structure for these children, and described how they use structure in their music therapy work, within which they give the opportunity for more freedom. More detailed discussion was had about the pupil being seen for individual music therapy who would be coming to the group. This is given in the pupil profiles below (p.142).

8.3 Relating Procedural and Tutor themes to the school music therapy group

At this stage the Procedural and Tutor themes were reviewed and their relevance to the gamelan therapy project considered. Having consulted them during the process of setting up of the group, it was appropriate to review which aspects of these themes were useful, and whether they had any relevance for the development of the guidelines for using gamelan in music therapy. I was also looking for similarities and differences involved in these themes from gamelan workshops run by the tutors and with music therapy using gamelan, which might inform my approach. Lastly, I identified procedural aspects to try out in the gamelan therapy group.

8.3.1 Procedural themes (PT)

PT1 Participants:

Children with learning disabilities was one of the most commonly worked with groups for tutors.

PT2 Setting:

The Special school setting was sometimes used by tutors, although more commonly the groups of children would visit the gamelan elsewhere.

PT3 Frequency and type of session:

This group would take place weekly, as is most usual in group music therapy. The majority of tutors who worked with this participant group ran one-off workshops, therefore this would be different to most of the tutor's work. A small amount of weekly classes were run by some tutors, usually with adult participants.

PT4 Length:

The duration of weekly sessions was not specified by tutors. 30-45 minutes would be usual in music therapy for this client group; I had to use what was dictated by the school timetable, a 45 minute slot, so this was not completely my choice. I chose a period of 8 weeks, this was in part practical, to fit in with school terms and other activities planned, and in music therapy terms, 8 weeks would be viewed as shortterm music therapy, so this is a recognised model of work (Oldfield, Adams and Bunce, 2003).

PT5 Group size:

The ideal group size suggested by tutors was between 6-15, for a range of ages. For music therapy a group of about 6 would be indicated for this client group. In the project, the size of the group was dictated by the school, in that it needed to be a naturally occurring group. I was not able to take 6 children out of different classes for several weeks in a row, the school timetable did not allow for this. The class eventually selected consisted of 9 children, therefore this was the group size.

PT6 Type of gamelan and tuning used:

The interview analysis suggested that the easiest type of gamelan to use would be Javanese or Sundanese in slendro tuning. Therefore, it was originally planned to use a selection of instruments from a central Javanese gamelan for the project. However, these were unexpectedly unavailable and the only available alternative was a Balinese angklung. This had a 4-tone tuning which was harmonious, so still fitted the criteria of an accessible sound world, but had more need for damping of the instruments, so in this respect was less ideal.

PT7 Set-up issues:

In line with this theme, a lot of attention was given to preparation of the project, developing good relationships with the host organisation (the school) with staff and with the co-workers involved around and within the group. Several meetings were had with everyone and information widely circulated.

PT 8 Combining media:

I decided I would at some stage bring some puppets, masks and pictures to show the context of the gamelan, and to possibly use. As a potential activity I had in mind the tutor idea of creating a story together with a musical accompaniment, possibly using puppets and mask.

PT 9 Musical structures and techniques:

In line with a general music therapy approach to group work with this client group, I planned to use a mixture of structured and unstructured activities, some precomposed and some free. I had all of the tutor-described musical ideas in mind when beginning the work. I thought traditional structures could be useful as a basis for creating the group music; tutors said that they would not start with learning a full piece with these children, as this could give a sense of failure. I planned to create our own 'traditional style' piece using simple elements which could be developed as the group became more familiar and confident with them. I planned to use free improvisation, and improvisation which used gamelan music elements, and see if a composition might develop from these.

8.3.2 Tutor themes (TT)

The Tutor themes were looked at to see whether I as the music therapist matched onto these, and to consider whether there was any relevance to the work.

TT1 Own experience of gamelan:

In line with the tutors' responses, I too was enthusiastic about gamelan when I first encountered it, as a student into the last year of my music degree. I enjoyed the social aspects and the sense of community it engendered, making friends through the group.

TT2 Relevant training:

I have a long experience of playing a range of gamelan; Javanese, Sundanese and different Balinese ensembles. I have never trained to teach it, but have a few years' experience teaching Balinese angklung to music students. Similarly to the gamelan tutors, I used my experiences of being taught to work out how to teach myself. In contrast to many of the gamelan tutors, as a music therapist I have been taught how to work with people who have special needs, and have experience in this area.

TT3 Aims of work:

The aims of the work were therapeutic. These were most closely aligned to the tutor aims of 'well-being', 'social skills', 'communication skills', 'team-work skills' and 'sensory awareness'.

TT4 Political issues:

This Tutor theme did not appear to me to have much relevance to the gamelan therapy project. Schools undertake a range of musical activities, the children are valued and encouraged to take part in many different things. There was not a sense of this group being treated unfairly and not given good musical experiences, as the gamelan tutors described.

8.4 The gamelan therapy group

The clinical work undertaken in this project will now be described, beginning with a description of the participants and the therapy aims, followed by a summarised case study of the sessions.

8.4.1 The group members

Information for each pupil is summarised from the pupil's school files, from their 'All about me' information sheets and from discussion with the class teaching assistants.

Stewart (age 13) is the oldest of the group who has a ready grin and a slightly dishevelled appearance. He is described as having general developmental delay; he was slow to develop language and tends to shout and speak too loudly. He finds listening to instructions difficult and frequently interrupts, making 'silly comments'. When talking, he finds it difficult to stop and listen to what is being said to him, and it can take some time to bring him back to activities. He likes to be the focus of attention, but can become upset very easily; also getting angry and being too rough. Physically he is quite large and has poor spatial awareness, for which he has received help in the past. As a younger child he was diagnosed as 'hyperactive' and there is some question as to whether he has attention deficit hyperactivity disorder (ADHD). The TAs describe him as being very dominant in the class.

Peter (age 11) has autistic spectrum disorder and some language difficulties. He has problems understanding language beyond a literal level and uses more speech than he can understand. He often has a rather blank expression on his face. Whilst he is aware of the difference between reality and fantasy he often talks as though the two are interchangeable. He had a difficult time at his primary school which in his mother's view left him 'emotionally fragile and with low self-esteem and lacking in confidence.' He has difficulties relating to other children in the class, often 'getting it wrong', misunderstanding situations and becoming tense and agitated. He likes being with adults to whom he tells stories. He is often in his own world and needs help to stay on task and focus on what he is doing.

Simon (age 12) is a small boy who has microcephaly and global developmental delay. He has received much speech and language therapy and can now communicate quite well. He had a lot of difficulties at his primary school and significant behavioural problems, which are now much improved, although he can have occasional physical outbursts. He is easily distracted and needs a 'firm approach' and structured lessons.

Lucy (age 11) looks older than her years. She has moderate learning difficulties and is quite emotionally immature. She has considerable difficulty with concentration and can be easily distracted, which has made learning difficult for her. She is significantly behind her age in literacy and numeracy.

Blake (age12) looks very young with an innocent expression. He is shy and lacking in confidence, with general developmental delay and a more severe speech and language delay which affects his understanding and spoken language. He is a quiet child, a 'passive observer' who places no demands on adults. He finds communication and comprehension difficult and struggles to think for himself in a classroom situation. He does not volunteer answers in the class.

Daniel (age 11) is a smiley boy who has significant global developmental delay and is of small stature. He has many gaps in his learning, but can express his thoughts and feelings well. He has many friends and treats people well. He is easily distracted and responds well to verbal prompts.

Lucas (age 11) has broad-based learning difficulties and delayed language skills. He is cooperative and responds to praise and encouragement. His attention control and fine motor skills are poor. He is a passive child, immature for his age, and plays alongside other children or by himself. He has some difficulties understanding and implementing the social rules of communication. He has problems following instructions and can become tearful if he feels he does not understand what to do. In class he is quiet and does not readily answer questions.

Justin (age 13) is a happy positive child with autistic spectrum disorder. He is social and has friends amongst his peers. He has a good imagination but lacks concentration in many activities tending to 'switch off' at times. He does not always remember things said a few seconds before or recall what has been covered in previous lessons. He needs reminders to stay on task and is described by the TAs as 'a wanderer in time and space'.

Isabelle (age 12) was born totally blind, and is on the autistic spectrum. She has many rituals and routines which she uses to help her feel safe and needs a lot of structure. She rocks and presses her ears with her hands to calm herself when anxious and has an adult with her at all times when moving around the school. Isabelle likes to be in control and follow her own agenda; she needs a lot of time to prepare for an activity, which must be carefully explained and structured for her. She can easily become upset and angry, when she can scream, pinch and bite. Although she used to have her own area for working in the classroom, she is now more involved with the other children and is developing some independence. She has difficulty understanding more complex instructions and has some speech. Isabelle has received individual music therapy sessions for several years.

Music therapy notes: Isabelle

Isabelle has received several periods of music therapy during her life. The current music therapist has been working with her for 2 years. Although this was initially viewed as a reason for Isabelle not to be included in the gamelan group despite being in the chosen ability group, after further reflection her music therapist felt it would be a shame for Isabelle not to have the opportunity to play the gamelan, particularly as she is so musical, and so suggested that she join in after all. The two activities would be significantly different, and have different names, so it was thought unlikely that Isabelle would confuse the two. Isabelle's music therapist described their session as being largely led by Isabelle, she is very rhythmic and understands chord progressions, but does not like the music stopping suddenly if she is not finished and always wants to know the names of tunes. Isabelle wants to be in control throughout her music therapy sessions and can become very difficult if not allowed to; she can harm herself (by head-banging) and others. This behaviour can escalate if attempts are made to intervene. The therapist recommends that if Isabelle becomes distressed during the gamelan therapy group the best strategy would be for the TA to take her out of the room.

In discussions with other staff about Isabelle joining the gamelan group, concerns were raised that she would be too anxious and overwhelmed by all the instrument sounds and the group music, and would need time to prepare herself for it. It was agreed that she would be given some individual time prior to the group starting to familiarise herself with the instruments. However, this proved too difficult to arrange and she began the sessions with the rest of the group.

8.4.2 Development of therapy aims

From discussion with the Access to Learning coordinator, the teaching assistants and the aims in the student files, an initial set of therapy aims for the group were developed:

1. Develop ability to work as a group by increasing awareness and tolerance of each other

- 2. Increase attention spans and improve concentration
- 3. Develop communication skills

- 4. Develop ability to contain and manage emotions
- 5. Have an enjoyable musical experience and gain a sense of achievement

In addition, some specific aims for individual pupils were identified:

Stewart:	to be able to be part of a group without dominating it To improve his ability to listen To be more aware of and able to contain his emotions
Peter:	to increase his engagement with others To stay focussed in the here and now
Isabelle:	to improve her capacity to be part of a group To be more able to tolerate not being in control
Simon:	to increase his ability to focus and remain on task to increase his ability to relate to other group members
Lucy:	to improve her concentration to help her to better understand and manage her emotions
Blake:	to increase his self-confidence help him to have a voice in the group
Daniel:	to help him to focus on an activity for longer
Lucas:	to increase his self-confidence to improve his ability to interact with others
Justin:	to improve his concentration and help him to focus on a task

It was hoped that the gamelan would encourage engagement in the activities, through which the therapeutic aims could be addressed.

8.4.3 Summarised case study

Initial stage: sessions 1-2

The main aims of the initial sessions were to introduce the children to the gamelan, show them how to play the different instruments, and to look at how to make sounds and stop them. I hoped to capture and sustain the pupils' interest, and to tell them a little bit about the culture and heritage. I felt it was important for the pupils to have a successful musical experience in the first session, so that they were not discouraged from playing the gamelan, or think it was too difficult for them. I decided to use both Balinese and Javanese musical structures to develop traditional style pieces and to keep in mind the possibility of a performance at the end of the 8-week block, if this seemed therapeutically appropriate. I also planned to have the children swap instruments and move around so that they had a turn on everything, as in usual gamelan practice where musicians can play all the basic instruments.

A structure for the gamelan therapy sessions quickly evolved; an opening greeting activity, choosing an instrument and trying it out in turn, a group piece, and sometimes looking at cultural artefacts.

The children reacted to their first sight of the gamelan with great excitement and enthusiasm, immediately rushing to the instruments to sit at them. They all quickly removed their shoes when this was explained and chose a cushion to sit at. Each instrument had a cloth cover over it, made of a silky blue fabric. We began the session with me lifting each cover off in turn to reveal the instrument underneath, before giving the child sitting at it a beater and inviting them to make a sound. During this introduction there was an atmosphere of increasing suspense and excitement, exclamations of surprise and wonder such as 'wow' and 'well I never', were made. There were many questions about the instruments, how they were made and where they were from. The reyong, possibly the most unfamiliar looking instrument (see appendix K) drew the most amazed responses: 'what the hell is that?' Lucy asked, and 'that looks expensive!' All the children managed to play sounds on their instruments quite easily, even though some seemed a little nervous or cautious, they still made an attempt. For example, when asked to try the gong, Justin said 'I'm called clumsy Justin, cos I'm clumsy' to which Stewart concurred 'Yeh, Justin likes banging stuff'. However, he then struck the gong very carefully and gently and after listening to it for a moment said 'it sounds like an echo, an echo in the water'. This sensitive response contrasted with the rather negative view he seemed to have of himself (and endorsed by Stewart).

Having tried out each instrument I led the group in creating a piece together by setting up an 8-beat cycle with a gong beat at the end of each cycle. This cyclical piece became the main group activity for all the subsequent sessions. Initially, I tried to give each child a simple pattern to play, based on the traditional musical role their instrument would have. This was based on time ratios, so the lowest instruments (the jegogan) had a very slow 4 minim beat part, just playing up the scale, the instruments one octave higher had an 8 crochet beat part, then quaver patterns were given for the highest and a rhythmic pattern for the reyong and so on. I played the beat on the drum. It quickly became clear that this was far too ambitious; the children struggled with holding a beat and repeating a melodic pattern, and their differing abilities became apparent. Whilst Isabelle was able to keep a very steady beat, most of the others could not initially play in time, either playing increasingly fast, or in an excited out-of-control manner; some appeared cut off and in their own world, and there was very little sense of connectedness to each other. However, they seemed to have enjoyed this initial playing, with many positive comments being made when the piece came to an end.

After the first period of enthusiastic and somewhat chaotic playing, I decided that whilst the children needed some clear direction and a sense of control, teaching specific parts was not appropriate. Therefore in subsequent sessions time was spent letting everyone make up their own patterns in turn. At times I would suggest a simple part, which because of the flexibility of the music they could adapt. For example I showed Lucy a pattern on the reyong which she tried but could not master; she then spontaneously played a simplified version which she could repeat. I said I really liked her version and she looked very proud and sat up at the instrument properly to play it. After the cyclical piece I would ask the group what they thought of the music. Some were very positive; sometimes they would say it was too noisy, so I talked with them about how we could make it a bit quieter by not all playing at the same time, and by listening to each other. I used hand and arm signals to direct the playing, bring groups of instruments in and out, indicating where the gong came, giving one child a solo spot and so on. This gave them some freedom to create their own music within a holding rhythmic structure. Some played the beat, some a slow melody and others their little rhythmic or improvised patterns. The children needed to watch and listen to each other for this, which they managed increasingly well. During the playing the teaching assistants helped children with their playing, and increasingly joined in on their own instruments. This cyclical musical structure became the core activity for the rest of the sessions.

All nine children were present in the first two sessions and there was often a lot of noise. The two TAs were joined by a third who I had not met before during the first session. It transpired that she had been assigned to this class for the afternoon and would be attending regularly. This meant there were now 13 people playing and the group felt very large. I became aware that at times I was beginning to feel more like a 'teacher' trying to get the class to play a piece of music, and keeping them under control, rather than a therapist. Although attention levels were generally very good, there was also a lot of 'messing around' by specific children such as Stewart, Simon and Lucy when having to wait whilst everyone had a turn at their instrument, as well as children becoming distracted and talking about other things. Stewart was very impulsive, often talking to whoever he was sitting next to, and would continue playing when I was talking to someone else, not stopping when asked to. However, when I gave him my full attention and showed him how to play the drum properly for example, we were able to have a spontaneous drum duet. He displayed a good rhythmic sense, played in time and created an ending with me.

At the end of session two I introduced a new activity with the aim of developing group awareness and a sense of community, by using a much simpler rhythmic activity without the distractions of playing the instruments. This involved clapping a question and answer phrase together; I clapped and said 'Hi, how are you?' (ta tate ta rest), somebody would answer and then the group would clap the rhythm of the answer. After a few attempts they began to get the idea of this and we split the group into two halves, one half asking the questions and the other answering. As well as directing the playing, I was also aiming to create an atmosphere for discussion and listening to everyone's views, by picking up on comments they made, asking what the others thought, and generally encouraging them to see the group as their own. A cooperative group atmosphere was beginning to develop; the children were attentive and listening to me, with no major disruptions.

Etiquette

Before letting the children play in the first session, I explained the idea of removing shoes to play and not stepping over the instruments. They immediately removed their shoes and thereafter always did so on entering the room usually without prompting. When in the first session a different TA came in and sat down next to Stewart, he told her 'you've got to take your shoes off, it's respect!' If any of the TAs forgot to do this in subsequent sessions the children were quick to point it out, perhaps enjoying being able to tell the staff how they should behave for once. The issue of damping the notes arose spontaneously; after I attempted to stop some loud playing by saying 'shh' Lucy placed her arm flat on the bars of the jegog and stopped the sound. I pointed this out to the others, asked Lucy to repeat it, and this led to a discussion and demonstrations of how we can 'stop' the sounds when we are playing. Whilst I did not suggest they needed to do this continually in a traditional manner (after each note) I noticed that children would often damp the sounds for themselves during their playing, would experiment with it, or place their arm over all the notes at the end of a piece when they wanted resonances to stop. I introduced the names of the instruments in the second session and this led to some humorous exchanges as they tried to repeat them and then came up with alternative names such as calling the 'pemade' - tomato, and saying that 'reyong' rhymes with crayon.

Sessions 3-4

Having established a structure for the group work, the second two sessions before the holiday break began to focus more on individual children and on the dynamics of the group. This seemed to be possible as the group was significantly smaller, with various children and staff absent. The initial excitement had waned a little and the children's different personalities began to emerge. Aspects of school life came into the sessions; the third session began late as the whole school has been summoned to the hall for a stern 'talking to' from the Head teacher regarding some bad lunchtime behaviour. As a result, the children were quite subdued when they came into the room, and maintained an air of having been 'told-off' for much of the session. Aware of this atmosphere I suggested we began with seeing how everyone was, and used the new clapping activity for this. I encouraged the whole group to say and clap 'Hi, how are you?' and then each child in turn to say and clap their answer, which was repeated by the group as a rhythmical pattern. This put the focus on each child to be listened to by everyone else and have their feelings acknowledged, and helped bring the group together. It became the opening activity for all the remaining sessions and worked well as a way to gauge the mood of the group, as well as picking up on any issues for individual children. As it developed, I connected this activity to gamelan music by using a drum to ask the question as leader, then giving the person answering the second drum to beat their reply. Then the drum was passed around the group as each person had a turn, whilst I tried to maintain a continual beat. This was similar to Balinese drumming where the two drums play interlocking and answering parts.

Rather than focussing purely on the music, as might be the case in a gamelan lesson for example, I continued to develop the idea that this was a place where we could think about ourselves and each other, about difficulties and feelings. So when in the opening activity Shane said he was bored, or Daniel was tired, these feelings were acknowledged and incorporated into rhythms, and then referred back to. When Lucy appeared fed up and made several negative comments about having to play gamelan, I acknowledged that she didn't seem very happy today and wondered aloud why that was. Lucy replied that she wanted to have a boyfriend at school. Lucy appeared to be having many confusing feelings about growing up which she was trying to understand. Another time her response to 'Hi, how are you' was, 'I'm in love!', but she did not wish to say more about this when asked.

As the children became more musically confident and able to focus for longer on their playing they took more responsibility for it, I could draw back a little and not give so many directions. As well as more focussed playing there was also a little more disruptive behaviour from some children, perhaps as they become more familiar with me and the gamelan. This often centred on who played which instruments with scuffles erupting as they rushed to be the first to sit at the gong. This was an example of the difficulties of the group had in being able to help each other and work together. To assist with this, I created a list of the instruments and wrote down who played what each session, reassuring them that they would all get a turn on each instrument. This seems to help with the sense of 'fairness' which they evidently felt was missing and the list was referred to often. In subsequent sessions I also put a name card on each cushion before the children came in. This saved time debating who played what, and the children were often eager to see where their name was. Later, as they become more able to negotiate I dropped these aids and the children were largely able to work out for themselves who sat where.

Just how much concentration it took for some of the children to sit and wait whilst each player had a turn working out their part and then putting them all together in a piece became clear when at the end of the third session Simon asked 'when can we play *our* music?' and Lucy added, 'can we just have a little fun time?' Whilst Daniel, Blake and Lucas were often very positive after group pieces, saying how 'great' or 'brilliant' the music was, Lucy, Simon and Stewart evidently found it hard work and wanted some sort of relaxation afterwards. Following these comments I suggested we play a two-minute 'free' piece in which the only controls would be my hand signals to start the piece, build up the sound, and then bring it down to end. This piece was lively with a lighter quality to it, Simon engaged in a sustained and playful drum interaction with me, Lucy started experimenting with the vibrations of the jegog and Isabelle explored the reyong more freely. Lucy's interest continued after the ending as she excitedly showed us what she had found out about the sound vibrations and asked other people to try it out on their instruments. It seemed to be difficult to achieve the right balance between free and structured playing for all the different children, and between focussing on the music and on talking. Working through these issues was a major 'task' of the group; I tried to bring whatever happened within or was brought to the group back to the group members to consider together.

Photo 13 Group playing session 3



In contrast to the anticipated difficulties, Isabelle was able to join in the group from the beginning. She usually arrived late as it took her a long time to negotiate the corridors with her rituals. Whilst Isabelle mainly talked to the TA helping her, who described what was happening in the group, she would also speak directly to me at times, answering questions and occasionally initiating them. I often gave her the role of keeping the beat, which she appeared to enjoy, and she played the gong very accurately, counting out the 8-beats to play at the end of. She usually asked to try all the instruments I talked about, and to touch all the artefacts. The group also became more mindful of her, Lucy often taking on a caring role, reminding Simon that Isabelle was going to play a particular instrument that week. In one session Lucy and Isabelle shared the reyong together and Lucy took a lot of care to help Isabelle play. When I suggested that we should let Isabelle have first choice of instruments as she was not able to rush over to one as they did, they readily agreed and waited for her to do so.

In session four there was much chatter amongst the children, some of it related to the gamelan, Lucas saying the gong mallet is like the one they use in a court, and some of it unrelated, such as Simon pointing out the holes in his socks. I drew the group's attention to this reflecting that it was very hard to get them together today and wondered what this was about. I suggested we listened to each person playing a solo on their instruments and this focussed their attention. In contrast to the previous distractedness, they all took a lot of care to play a small solo. Peter, who often seemed to be mentally absent and in his own world, playing quite mechanically in group pieces, now played a short melodic phrase with real attention, which drew enthusiastic praise from the TA. Simon forgot about his socks and played very deliberately, incorporating careful damping of individual notes into his pattern. Justin played with enthusiasm on the reyong, declaring happily 'I've got rhythm in my heart!' Stewart had been very talkative up to this point in the session, constantly complaining about Simon having stood on his finger, and asking the TAs about all sorts of unrelated matters. When his turn arrived he suddenly became very unsure of himself and did not want to play. I realised he did not know what to do and suggested a way for him to play that he could manage. It was becoming clear that behind his 'larger than life' persona, Stewart was lacking in self-confidence and he could easily experience feelings of inadequacy. The group piece which followed on from these solos was the most musically accomplished so far, with long periods of a shared beat and lively rhythmic patterns. Stewart, although not willing or able to join in the playing, 'bopped' along to it, dancing whilst sitting, and showing his appreciation.

It was becoming clear that if a pupil disengaged from the playing or the group it could be because they felt they did not know what to do or thought they might fail, rather than that they were disinterested. Therefore it was important to accept all their musical contributions positively, and to be encouraging and remind them of how well they were doing. Blake, who the TAs had described as being very insecure and not very able, tried all the instruments without needing any encouragement. He took great care and effort in his playing and often looked quietly delighted with his results.

Photo 14 Blake playing a solo on the reyong, watched by group

Stewart struggled to join in with the group, often taking on the role of the 'difficult' one which it was hard to bring him out of. He was often preoccupied with events outside of the session and his frequent feelings of injustice. He was also on various behavioural programmes with the TAs and behaving well in gamelan therapy appeared to earn him points. This was never explained to me and rather than draw attention to it I generally ignored it and left it as something between him and the teaching staff. If this had been a longer term group it would have been necessary to agree with the TAs how this programme was used in the therapy sessions.

Mid-way review

After four sessions I reviewed the group with one TA, Suzy. It was important to relate the children's behaviour in the gamelan therapy sessions to their usual classroom behaviour in order to have a perspective on what was usual for them, having only known them for a short period of time. This was where the inclusion of the regular classroom teaching assistants was invaluable. Suzy's view was that in general the gamelan therapy was going very well; the children were enjoying it, as evidenced by the fact they all joined in and were generally quiet. She thought that the group were very well-behaved in the gamelan sessions, there were only very mild behaviour problems compared to usual. In the classroom there were far more problems with children remaining on task. Daniel, she said, loses attention much of the time in class, but was very attentive in gamelan therapy. Justin, 'never knows what's going on' in class but she was surprised at how 'on-task' he was in gamelan therapy. Stewart, Simon, Peter and Lucy were the most difficult in the group she thought. Lucy she described as 'a bit of a teenager' who would frequently say 'oh do we have to do this' about most activities in class. She recommended that I did not take Lucy's negative comments in gamelan therapy too seriously, saying that if Lucy really did not want to be there she would be behaving very differently. However, Suzy felt that Isabelle was struggling; she saw her as being very anxious, always having her hands on her ears. Suzy felt this was due to her need to be in control, and it was difficult for her not knowing when the sounds were going to come in session. We discussed whether we could prepare her more for this by telling her when music was going to begin. This short review helped my understanding of the group and informed my thinking for the second half of the project.

Sessions 5-6

After the break the group recommenced with all the children and staff present again. There was much excitement and talking. The children had remembered a lot of the activities from before and we easily began the 'Hi, how are you' opening activity, this time with two drums. There was a real sense of the children now owning the group as, for the first time, they included me in this activity. Lucy pointed out that I had not had a turn and all the children joined together to ask me the question. They also remembered some of the instruments' names and had fun making up new ones. Stewart was particularly overactive, talking endlessly, trying to get other children's and staff's attention and resisting any contact with me. As the group became more disrupted by this I pointed out how hard it was to get everyone's attention and play some music and asked the group what they thought was happening. Daniel answered 'No-one's listening' and Lucas said 'Not everyone's paying attention'. In contrast to this awareness, Lucy put a cloth instrument cover over her head, perhaps not wanting to be serious. Having acknowledged the difficulties, we continued working on the creation of a group piece using ideas from previous sessions, and the group discussed the music they made. Before finishing I showed the children some photos of Balinese musicians and dancers which they were very interested in. Lucas excitedly took up the idea that we were a gamelan 'orchestra' and suggested we could play at a festival. This led to lots of ideas from the children about who we could play for.

Stewart became increasingly disruptive in these sessions, seeming to be unable to control his behaviour - his impulsive talking and singing. In addition to the TAs frequently asking him to be quiet and to behave, some of the other children now also told him to stop, again showing that they felt this was their group which they wanted to protect. The group music continued to develop; I decided to give the TAs the beat-keeping instruments to play, which helped the group to stay in time. A ritual which emerged spontaneously was listening until all the instruments had stopped ringing at the end of the playing. The gong player would play a final note and then everyone listened until they agreed they could no longer hear it. In this period of shared attention the group was really working well together; a cooperative and friendly atmosphere had by now developed.

Photo 15 Showing each other the mask



Stewart was at his most disruptive in session six, constantly leaving the room, dominating the talking with unrelated matters, making jokes and trying to get the TAs' attention. Peter was drawn in to this, and he and Stewart played around in front of the video camera together. Simon was now less interested in 'messing about' with Stewart and was increasingly engaged with the group, focussing on his playing and seeming to really enjoy being creative. Later in this session I talked some more about the Balinese culture, showed them where Bali was on a map and introduced a dancer's mask and a shadow puppet. The children were very quiet and attentive as I did this, seemingly fascinated by the artefacts, particularly when I made the puppet 'talk' to them. These were then passed around and everyone had a go trying on the mask or moving the limbs of the puppet, making up voices for it. Isabelle was able to feel them with her hands as Suzy described them to her. This seemed to spark their imaginations, and we talked about using the puppet to make up a story together the following week. In a moment which marked something of a turning point for Simon, he carefully put all the covers back over the instruments, unasked, before leaving at the end of this session. He maintained this helpful attitude for the rest of the sessions.

Photo 16 Trying the puppet out



Sessions 7-8

A positive and productive mood characterised the final two sessions. When moving around the school during the lunch hour to set up the session each week I heard group members telling other pupils in a positive voice that they had their gamelan session today; Simon greeted me cheerfully in the corridor saying 'see you later', and whilst lining up outside the room in week 7 Daniel told everyone 'this is my favourite lesson!' In contrast, Stewart was more subdued in the seventh session, having been taken out of the room as the session began by the head teacher for a talk about his behaviour. He was then absent for the final session. Consequently there was less disruption and more of a working atmosphere in the last two sessions. Stewart did seem more able to control himself and we reflected a little together on his behaviour in the group; he acknowledged that he had been 'playing up' the previous week and that it was annoying for everyone else. In the 'Hi how are you' activity Stewart passed the drum on without playing, and looking miserable. After some discussion with him he eventually told me he was 'not a happy bunny today'. I drummed this phrase, which Stewart found very funny, saying 'you must be the only person to make me laugh today'. By acknowledging the feelings behind Stewart's disruptive behaviour we were able to make a tentative connection in which Stewart felt heard and did not need to 'act out' as much. Later on I suggested to him that I thought he might enjoy joining in the playing but that he did not let himself; he appeared to quietly reflect on this. Stewart seemed to be quite unhappy, later commenting 'I wanna live a *normal* life.'

The group had decided that they would like to do a small performance in the final session. We spent more time working on the music, and consequently the previous

idea of creating a story was not taken further. Most of the children were really engaged with the playing now, finding patterns, trying out the new beaters I had brought and practising damping. I asked the group to try playing one note in time together, using the 'Hi, how are you' rhythm, and all playing on 'you'. The group piece developed from this and was quite complex. Blake was able to play consistently in time, his playing and general presence in the group having become much more confident. Daniel continued to play enthusiastically but still could not quite organise his playing into a beat or rhythm. However his enjoyment was very evident. During this session I asked the group again who they would like to invite to the final session to play to. 'Mummies and Daddies' was the excited response, however I pointed out it was a little too late to organise this. There was a mixed response to the idea of some teachers coming in, and the head teacher was also suggested. We agreed that the children would ask their form teachers, the year head and the head teacher. Suzy asked if they would like some of the other children to come and this received the most enthusiastic agreement. They seemed keen to show their parents and their peers what they had been doing and I felt they had a sense of pride and accomplishment in what they had achieved. We chatted about their favourite instruments and I suggested they chose one for the final piece the following week and that we would work out together who sat where - showing that they had improved in being able to think about and negotiate with each other.

There was much excitement in the final session. I reviewed what we had been doing over the past weeks, and the TA Gemma took a picture of each of the children at their instruments to put in their school folder, and possibly to show their parents. There was some concern about whether we would have an audience to play to, the head was not available and Simon brought a message from his teacher saying she could not come; however, it seemed important that the children themselves had asked their teachers.

The group worked well together in choosing how to play a piece, what notes they should all play and what patterns. Simon aligned himself with me as we both played the drums; he maintained my rhythmic pattern whilst I helped others. Lucy, who had not been present the previous week, found it the most difficult to join in, and lay down behind the reyong. When she did not respond to my asking her to sit up, I suggested to the group in a whisper that we wake her up with the puppet which they were all excited about. I made the puppet talk to her saying 'Are you asleep Lucy?' and pointing its finger at her. She and the rest of the group found this very funny, and Lucy was able to join in again with the group which had a relaxed and focussed atmosphere.

Photo 17 Waking Lucy up with the puppet



As each child played a solo on their instrument to use in the final piece, it was striking how much their concentration and listening had developed. They were focussed on the task and listened attentively to each other. During this period Isabelle became a little distressed, finding it difficult to play the reyong. For the first time she showed a little anger and threw her beaters down, making distressed vocalisations. Whilst her TA told her to calm down, I reassured Isabelle that she could have a pause and did not need to play anything until she felt ready. Isabelle became quiet and her behaviour did not escalate.

The TA Jane brought a small group of other children in to watch us and the group played a cyclical piece for them. This showed the development they had made in their playing, with periods of rhythmic interlocking on the reyong from Lucy and Isabelle, Lucas playing a very steady beat on the jegog, and the children able to come in an out on their instruments following my hand signals. Simon helped me lead with the drums. All were concentrating well and taking great care in their solos. The exception was Peter who was still disengaged from the music, mainly looking at the video camera and making faces into it. The piece ended with Isabelle saying 'stop' as the others played quieter in response to my hand signals, then I played a gong and there was absolute silence as they listened to the reverberations dying away. The small audience clapped enthusiastically. Time was now up and I praised the group for how well they had done in the eight weeks and the amazing music they had made and asked if they wanted to say anything about it. Daniel said he 'loved it', Justin said it was really good, he enjoyed all the things he had learnt and Simon said he had enjoyed it all. To finish I suggested that they could all play a final beat on the gong and they lined up to do so, then with lots of 'byes' and 'thank-you's, they put their shoes on and left. There was a very positive and relaxed atmosphere as they did so.

Following the final session I met with each of the TAs and asked them for their views on the group in general, and on how it had met the group and individual aims. The original intention had been to talk with them as a group so that they could discuss their responses together, however this was not possible and I interviewed them individually. These interviews were recorded and transcribed.

8.5 Review of therapy aims and outcomes:

I will now review the group and individual aims for the gamelan therapy group, and consider how well these were met. In doing this I will be presenting the views of the teaching assistants, as given in the post group discussions, and my own views and impressions.

8.5.1 General aims:

1. Develop ability to work as a group by increasing awareness and tolerance of each other:

The TAs thought that there had been some improvement in this. They pointed out the ability to work together as a group did seem to depend on who was there; that Stewart found it very difficult to control his behaviour and would set Simon off, then Lucy would want to join in. In general though, they considered the children became more tolerant of each other, and were particularly aware and accommodating of Isabelle. Suzy said 'I think they learnt to respect each other a bit more.' She also pointed out that no one had walked out of the group, which they sometimes do in lessons. The routine of the sessions was felt to be important, Jane thought that they were able to work better as a group the more they knew what to expect from week to week. She pointed out that it was a large group to work with when the children had such individual needs. I felt the group became more able to work together, through the development of a group culture. One aspect of this was shown in the way they went to instruments and chose who sat where. As time went on they were more accepting of the need to give each other a chance to play everything, and by the end were able to work out who would play what for the final piece. There was a relaxed atmosphere in which discussions could be had about what was happening in the school, how they were feeling and about the music. They increasingly took ownership of the group, telling each other to be quiet so we could get on with what we were doing, and thinking together about the effect of each other's behaviour a little.

2. Increase attention spans and improve concentration:

The TAs thought that the children listened well to each other and to me during the sessions and that their concentration had improved over time. Gemma noticed a weekly progression; that they were able to be quiet and know when it was someone else's turn. Suzy thought they took more notice of each other as time went on. The TAs all expressed surprise at how well the children did in the group playing, that they could cope with all the sounds, could follow my hand signals and wait to come in and out of the playing. Suzy felt they became more able to stay 'on task'.

3. Develop communication skills:

The opening clapping/drumming activity was thought by the TAs to be very effective in developing their communication skills. Gemma was very impressed at the way the children listened to the gong at the end of the piece each week and the eye-contact they made in agreeing whether it had stopped ringing. She also felt that it worked well when I was positioned in the centre of the group, that they all looked at me for signals and made good eye-contact with me.

4. Develop ability to contain and manage emotions:

This varied from child to child. In general there was some improvement for certain children but not for others, as described in the following review of individual aims. This is an area for which longer-term work is more appropriate, however, despite the short-term nature of the project, I think the group itself was quite containing; emotions were held and explored within it. 5. Have an enjoyable musical experience and a sense of achievement: Jane said she thought that what the children really enjoyed was that I did not teach them a set piece of music (as in music lessons); that the music was generated through and by them. They liked that there was no failure with this and 'nobody felt they couldn't do it'. This, she felt, was an important element in the success of the group.

All the TAs felt that it gave the children a sense of achievement and that most of them enjoyed the music and sounds. Suzy said she thought the music was quite pleasant, she liked the instruments, and was amazed when the children could keep the beat. I noticed that there was a lot of laughter and smiling within the group, indicating that it was enjoyable for much of the time, and several of the children appeared to show a sense of pride and achievement after they had played individually, and after group pieces. The enthusiasm with which they developed the ideas of showing their parents and their peers what they could do indicated something of their sense of achievement.

8.5.2. Additional aims for individual pupils:

Stewart: to be able to be part of a group without dominating it to improve his ability to listen to be more aware of and able to contain his emotions

All the TAs thought that Stewart had a negative impact on the group; responding to his behaviour took over much of the group time. There were a few occasions when he was able to be part of the group on a more equal basis but generally he either 'messed about' or 'sulked'. The group seemed much easier to work with when Stewart was absent. The TAs did not feel he benefitted much from the group, although Gemma was of the opinion that much of his more disruptive behaviour occurred when he was concerned about events happening to him outside of the group. Gemma thought that when Stewart focussed he could be 'brilliant', that he had many skills but his behaviour held him back. His behaviour is thought to be compulsive and he finds it very difficult to control himself; Jane commented that he needed an 'off' switch. I found that at times, when Stewart felt really listened to he was able to respond, such as when I focussed on his unhappiness in the drumming circle, and when he was given time to play solo. At these times he was able to control his emotions. I feel that in a group of this size it was not possible to work effectively with Stewart, and he would benefit from some 1:1 therapy.

Peter: to increase his engagement with others to stay focussed in the here and now

Jane thought that gamelan was 'really not Peter's thing'. She says he is generally not interested in music, and he would have been hard to engage even without disruptive people in the group. In slight contrast, Suzy and Gemma thought he listened quite well and was reasonably engaged. They thought he did not really know what was going on much of the time, played when I asked him to and could be quite rhythmic. He did not completely switch off and start talking about something else as he often does when something is too difficult for him apparently. They thought that a smaller group or a 1:1 session would have been better for Peter. I thought Peter seemed very absent in the group for much of the time, fiddling with his cushion or instrument and not really attending to the group. He became very animated when he noticed the video camera in the room, and would increasingly play around and make faces in front of it. I only noticed some of this behaviour when viewing the recordings later. I realised that he thought he was being observed through this and asked who he thought was watching, to which he had no answer. He seemed quite disappointed when I explained again that the recording was not going to be seen by anyone other than me and work colleagues, nor was it going to be put on YouTube as suggested by Stewart. I felt Peter was very hard to reach; it was difficult to connect with him other than on his own terms. For example he did not engage much when I talked to him about the consent form, but when we then walked together to the school hall for assembly and he told me all about a computer game he was playing in a very animated fashion. These kinds of monologues about subjects he is fixated on are apparently common for him.

Isabelle: improve her capacity to be part of a group to be more able to tolerate not being in control

These aims were fulfilled, as evidenced by the fact that Isabelle attended all of the group sessions for the whole time, joined in with all the activities and did not have any episodes of difficult behaviour. She was part of the group and tolerated not being in control. When I gave her some specific controlling tasks, such as saying 'ready, steady, go' for taking the covers off the instruments, she seemed to enjoy this, but did not insist on it at other times. There was something of a split opinion amongst the TAs about her response to the sessions. Gemma, who was her main 1:1 TA, thought she did very well and enjoyed it. She thought it was 'amazing' that Isabelle was able to cope with all the noise in the group and listen to it, that Isabelle was 'brilliant' on the 'Hi, how are you' activity, always clapping the rhythms and was very impressed with Isabelle's ability to count and play the gong every eight beats. Gemma found it positive that Isabelle tried several of the instruments, not just sticking to one, and that she was flexible and definitely a part of the group. Jane also thought the group was 'fabulous' for Isabelle, as it was something that she could access on the same level as everyone else. She noticed that Isabelle listened intently during the sessions and could be quite flexible. In contrast, Suzy, who also was with Isabelle 1:1 some of the time in classes, thought that although she coped with the group better than expected, questioned how much she had enjoyed it, suggesting that she perhaps just put up with it. She thought that Isabelle was very tense during the sessions because she did not know what was coming next, there was a lot of talking and noise, and she couldn't just play the beat all the time. Suzy interpreted Isabelle keeping her fingers or hands over her ears much of the time as evidence of her tension and anxiety, whereas Gemma said it was to dim the sound as Isabelle hears sounds much more acutely than others, hearing echoes and reverberations. Given this information, it was interesting that Isabelle frequently played very loudly herself, hitting the flat gong on the beat with considerable force and wanting to play the beat on the ceng-ceng, the percussive cymbals which also make a lot of noise. Isabelle was increasingly able to make active choices about the instruments she played, and ask for them, therefore I did not feel that she was 'just putting up with' the group, but was committed to it and involved with it. She spoke directly to me as time went on, not just to her 1:1 TA, but did not talk to the other children, except when being helped by Lucy as they shared the reyong. All the TAs agreed that it was useful and successful that Lucy started the group along with the others and that she was treated in the same way,

without special concessions being made. This approach was increasingly being taken in the school and Isabelle was finding it difficult to adjust to.

Simon: to increase his ability to focus and remain on task to increase his ability to relate to other group members

The TAs thought that Simon developed significantly in his ability to stay on task during the sessions. His concentration improved and he was less distracted by Stewart and more focussed on the music. He seemed to respond particularly to being given responsibility in the playing, such as when given the drum to keep the beat. Suzy thought that he had been really excited in the earlier sessions which had led to some of his 'distracted' behaviour, but he was able to control this much better by the end. I noticed that Simon began to be much more involved and committed to the group as time went on; it became something that he was proud of and felt he belonged to. His ability to relate to other group members changed a little, in that he talked with them more about the group activities, rather than messing about and having 'beater fights' as at the beginning.

Lucy: to improve her concentration

to help her to understand and manage her emotions better

Lucy's concentration remained variable, at times she was very involved whilst at others she would seem to switch off and lay on the floor. This view was endorsed by Suzy and Jane, who said she tends to opt out of activities a lot, and is easily distracted by Stewart and other things going on. Lucy missed a few of the sessions which I felt did not help her sense of engagement with the group. However, when sharing the reyong with Isabelle she worked with great concentration and helped Isabelle in her playing. I thought that Lucy was struggling with her emotions; she was very sensitive and would have benefitted from a smaller group to give her more 1:1 attention and time to explore her feelings in more depth.

Blake: to increase his self-confidence help him to have a voice in the group Blake exceeded the aims created for him. All the TAs were impressed with his engagement with the group, as was I. He joined in straight away and tried out all the instruments; all the TAs saw his confidence increase considerably week by week. They noted that he smiled a lot in the group and seemed to be really enjoying it. I noticed that Blake put a lot of effort into all his playing, he was very careful about striking the instruments, and very engaged in creating the sounds he wanted, listening to him and the group. He became more able to play in time for short periods by the end. The TAs were particularly impressed with the way that Blake began to take initiative and to speak out in the group. In the classroom, they said, he is very shy and finds it difficult to say things. Jane mentioned that he often feels sick as he is so anxious, and cries when he has to do something in maths. However in the group he began to say what instrument he wanted to play, once standing his ground by the gong when someone else took it when it was his turn. He spoke out about what was difficult in the group, and took the initiative to include me in the 'Hi, how are you' activity and asked me the question. This showed a real improvement in his self-confidence, and in taking an equal place in the group along with his peers.

Daniel: to help him to focus on an activity for longer

The TAs thought Daniel did very well in the gamelan sessions. He was consistently enthusiastic, and frequently said how much he enjoyed it. I thought he maintained focus throughout the sessions and his attention did not appear to wander at all. The TAs talked about how in class he always says that things are 'easy', but he cannot do them. He has problems with coordination and memory. Whilst Katy wondered whether he remembered anything in the gamelan sessions from week to week I felt that his memory was actually quite good; he knew what instrument he had played before and how to play. Gemma thought his hand-eye coordination improved during the sessions. He was also involved in thinking about how to improve the group playing. Gemma noticed how he particularly enjoyed it when I used the shadow puppet and thought that he would have enjoyed making up a story with it as discussed.

Lucas: to increase his self-confidence to improve his ability to interact with others The TAs thought that Lucas was less confused in the gamelan sessions than he often is in class. They thought this was because the activity was quite simple, and instructions were broken down into small pieces. They felt he enjoyed the sessions and seemed quite self-confident throughout. As someone who often forgets things, they thought it was very significant that he remembered he had missed the session in which I brought the puppets, and asked me the following week to show me what we had done with these. He was able to interact with the rest of the group mainly through the music rather than verbally; listening and joining in the playing. His levels of verbal interaction did not change much during the eight weeks.

Justin: to improve his concentration and help him to focus on a task

The TAs agreed that Justin was able to focus on the group most of the time. He did not drift off into 'cloud cuckoo land' as he apparently increasingly does in lessons; his imagination can take over and he will talk nonsense. In the gamelan sessions Justin frequently had lots of ideas for playing; he was very imaginative in his improvisations. Although he would play a complicated pattern he often got muddled when trying to repeat it. However, on the reyong, he managed to do this in a very musical and stylistically appropriate manner. This may have been because he only had two notes to use and could focus on a 2-handed rhythm which was simpler. I noticed that Justin began to lose focus in the last two sessions, seeming quite irritable and less relaxed or engaged with the others. His autistic features seemed to be becoming more pronounced in the group, and with more time I would have explored this with him further.

8.5.3 Other outcomes

In addition to those relating directly to the aims, there were several outcomes and benefits of the group commented on by the teaching assistants. Gemma noticed that playing the gamelan helped some of the children improve their hand-eye coordination, which was a difficulty some struggled with. Suzy commented that what worked well in her opinion was that this was a practical activity. She felt that the children did not really retain information they were taught in lessons, and she was very surprised that the children began to learn and remember the names of the instruments and the country they came from. She thought the puppets were very effective and could be made more of, and that the visual elements of the gamelan were what enabled it to be effective.

All the TAs said they could think of other pupils in the school who could benefit from gamelan therapy sessions, perhaps more than those in the group. They suggested that pupils with visual and sensory impairments would particularly benefit. One said they would have preferred to have hand-picked who was in the group; that some of the children 'did not deserve' to be there. Jane said that having experienced the group herself, she could now think of specific children for whom it could be helpful, but she would not have been able to before if she had not tried it. She thought of a child who had 'confidence issues' and a child with severe hearing impairment who she would select. The TAs all thought that sitting in circle worked well, that everyone could see and look at each other. Suzy thought that it was the combination of the visual and aural elements which worked well and drew the children in, commenting that these children need more visual aids to help them with simple activities. She also felt that what was effective was the way I broke the playing down into stages, and did not give long, complicated instructions.

From the discussions with the teaching assistants and my own review of the work it is clear that there were many therapeutic benefits to the gamelan therapy sessions. Many of the initial therapy goals were achieved and some new outcomes identified.

8.6 Evaluation of Key themes

I will now look at each of the Key Themes in turn and relate them to the gamelan therapy group. I will consider how well they applied to the group and whether they describe the therapeutic benefits of gamelan playing in this context. Which aspects of the Key themes were useful and matched aspects of the therapy group and which were different will also be reflected upon.

8.6.1 KT1 Accessibility:

Can see how to play it - Physically easy to play - Accommodates range of abilities

The children had a range of abilities. All were physically able to walk and did not have any significant physical problems, so were able to sit on the floor, hold beaters and play the instruments. They had a range of learning disabilities and levels of understanding, therefore I provided instruments which were mostly clear to play, and required a range of playing actions. These offered the children different playing experiences; some found certain instruments easier to play than others. For example, the reyong needed two-handed coordination which some found more difficult. The children did not experience technical difficulties in playing, and this appeared to give them a sense of achievement. Blake, described as a 'passive observer' immediately tried the instruments, and played consistently with conviction throughout. Lucas, who had difficulty with fine motor skills, was able to play all the instruments and maintain a simple two-handed pattern on the reyong. Isabelle, who was blind and autistic, needed help to locate and play the instruments. Although she was the most physically disabled, and appeared to have more severe cognitive and psychological difficulties than the other children, she was the most musically able, being the only child capable of playing the gong every 8 beats. Her psychological problems rather than her visual impairment prevented her from developing her playing more, as she often had one hand pressing on her ear whilst playing with the other. I felt she needed more time and individual attention to become familiar with the instruments and to become less anxious. This may have been possible in a much smaller group of 3-4 children. Isabelle needed a 1:1 helper all the time, however, as the group developed she was also helped by other children, notably by Lucy when they were playing the reyong together.

Is highly adaptive – different ways to create a sound

A few adaptations were made; I changed the wooden pointed-end hammers for rubber xylophone beaters to use on the gangsa (metallophone-like) instruments. These were safer to use and produced a quieter sound that did not require as much damping as the wooden ones making them easier to play with. However they did not produce a very sharp or resonant sound which was not always satisfying. For example, at one point it was evident that Justin was quite frustrated with the beaters, he could not get the fast, rhythmic patterns he was playing to sound as he wanted. I brought him some specially adapted harder beaters the following session which worked better. The poorer quality of sound possibly affected the appeal of these instruments; I wondered if Peter stayed on this instrument most weeks partly because he could hit the bars aimlessly with the rubber beater without much sound emerging which was noticed, either by him or the rest of the group. It would be useful to develop some specific beaters which were usable by children such as these which still produced a satisfactory sound.

The placing of the instruments in a circle rather than in parallel lines worked well to encourage communication within the group; all could make eye contact with each other, see as well as hear what each other were playing, and it was possible to direct the playing using visual cues. As some of the children had a tendency to 'switch off' it was important that their faces could all be seen, and their attention could be easily regained visually as well as musically.

Sounds musical straight away

The four-note pentatonic scale was very accessible; there was no need to specify which notes anyone played, as they all fitted together and it was possible to create a musical group experience very quickly. There were no harmonic clashes and the children frequently said it sounded good. Interestingly, the TA Jane said that the class had done some pentatonic work in music lessons in the past using keyboards and that they could not do it. She said everyone failed at it, week by week and they were 'bored to tears by it'. The use of a pentatonic scale in playing gamelan, where there were no other notes to avoid, was evidently a much more positive experience for them.

8.6.2 KT2 Encourages engagement:

Visual appeal and value of instruments

The set of instruments used were brightly coloured with some carving, so had the visual appeal noted in this theme. The children were immediately excited by the appearance of the instruments and were drawn to them, rushing to play them every week. The ritual of taking the cover off each instrument to reveal what lay beneath grew out of this interest in the look of the instruments. The TA Suzy thought this was a very effective ritual; it built up a sense of anticipation and focussed the children's attention. Even though this was a class activity in which everyone was expected to take part, it was notable that in general they did so with much enthusiasm. Some children refused to play at times, for example Stewart, but this was usually related to their emotional state at the time and to events happening in the school, rather than a specific lack of interest in the instruments

or music. Behaviour such as Stewart's was viewed as a part of the group therapy process and addressed within this.

The children were also impressed by the quality of the instruments, another aspect of this theme, exclaiming 'that looks expensive' about the reyong. This, along with the fact that they were the only class playing the gamelan, contributed to the overall sense that they were having a 'special' experience in the school and possibly a sense of being given something of great value.

Sounds and music

The children were interested in the distinctive sounds of the instruments, and noticed differences between them and the ways they resonated.

Physicality of instruments

None of the Angklung instruments used were as large and solid as those described by tutors as encouraging strong physical playing, however, the two most physical boys in the group, Stewart and Simon, were both were drawn to the drum, which they could play with energy and physicality. As the instruments were not arranged in the right-angled 'pens' which tutors mentioned as providing physical containment, this aspect of the theme was not relevant. However, I think aspects of the music were containing; the cyclical musical framework 'held' the children as they came in and out of it with their playing.

Lack of preconceptions

None of the children or the accompanying staff had seen a gamelan before, and it was experienced as a 'level playing field' as described by the gamelan tutors. The children who were usually less able or accomplished, such as Blake and Lucas could be able and skilful, often more so than other children who were usually seen as better at class activities than them. There were several occasions when the group really seemed to appreciate that the staff were participating equally in the playing, and were no more experienced or able than the children. This was a change in the dynamic of the staff-pupil relationship as it normally existed, and in these moments, a warm collaborative atmosphere developed, which was appreciated by both children and staff.

Enjoyable experience

In general the children appeared to find gamelan playing an enjoyable experience and get a sense of achievement from playing it. This was very important for the children who struggle with learning and for whom this might be an activity in which they were able to perform at least as well as other, usually more able, children.

8.6.3 KT3 Offers many group work possibilities:

One of the main aims of the gamelan therapy was to enable the group to work together better, therefore this theme was of particular relevance.

It is a group of instruments forming one instrument

It was clear to the children that the instruments were all related and belonged together; they did not request any other instruments and treated the gamelan as one entity, readily swapping between the individual instruments.

Inherently group music

The gamelan offered an instant way for us to begin working together as a group. I did not need to explain that this was group-work, it was self-evident. I introduced all the musical ideas as ways to play as a group and used traditional idioms for this. The main musical activity was the creation of a group piece, which was based on traditional concepts, greatly simplified. As each person's part was one element of this group music, it was easy to find something for everyone to play, and for all their playing to be adapted to suit their ability. We only played group music, and there were no attempts at solos outside of this, the children seemed to view the playing as belonging together. As found by the tutors, the gamelan was a resource which could be used in various ways for the group. The 'hi, how are you' activity was not a piece of group music as such; I was asking each child about how they were feeling today. However, by having all the children clap the rhythm of the question and the given answer together, it was possible to make it into a group activity. Adding the drums to this and passing one drum around linked it to gamelan music. This was a music therapy activity, which was adapted to use gamelan ideas of rhythm and drumming.

Development of communication and social skills

Playing the gamelan and talking about it required the children to use communication and social skills; they had to take turns, listen to each other and respond, make choices, and be patient whilst waiting for others to have a turn. The TAs remarked on the improvement of these skills for various children. Some children were able to be more assertive and find a voice, for example Blake when choosing which instrument he wanted and asking me how I was in front of the group. Concentration levels improved significantly for several children and in general the group was more able to listen to and leave space for each other by the end of the eight sessions.

Learn how to work together as a group

This particular group already existed as a class ability group. One of the main therapy aims was to help them work better together, to 'gel' as a group; the existing group culture could therefore be interpreted as not being very strong. The gamelan therapy sessions strengthened this and helped them to form closer bonds with each other. The creating of music brought them together, and the increased cohesion of the group came primarily from this. As the group progressed and more music was made, the way the group talked together after playing changed, became more relaxed and group oriented.

The way the teaching assistants related to the children was also an important factor in the group dynamic. They had to take a different role than in the class room; I asked them to follow my lead as much as possible and not to take such a disciplining role as usual. At times they seemed to find this difficult and occasionally told the children off and used threats to get them to 'behave'. However, they also began to be part of the group on a more equal basis. It quickly became the norm that they would join in all the playing. They also had a containing role, sitting next to or between more disruptive or distracted children, and helping them to focus. In the 'Hi, how are you' activity, when I suggested we ask the TAs how they were too, the group enthusiastically agreed; they seemed to enjoy the TAs joining in as one of them. In time the TAs were also more honest in their answer to this question, for example one week Suzy replied 'I'm really tired' and the group wondered aloud why this was; Stewart asked if it was because he was messing about so much. A sense of concern about each other developed.

8.6.4. KT4 Therapeutic effects:

Instrument sounds

It is difficult to know whether the sounds of the instruments had any specific effect on the children. They sometimes commented spontaneously that the music sounded good, or that they really enjoyed it. This sub-theme from gamelan tutors inferred that the sounds in themselves were therapeutic; more detailed investigation would be required to clarify this. The TAs talked of finding the sounds and the music very relaxing, identifying something more general about the effects.

Wellbeing -mood change

In a therapy activity, participants' moods could be expected to vary throughout the session as different feelings and emotions are aroused. Whilst the tutors identified people's mood improving as a result of playing, this would not necessarily be the primary aim relating to mood in a music therapy group. Some of the children began the sessions in a very excited manner, others could be in a distracted mood, or seem a little low in mood. This was often addressed within the therapy. For example the reason for Stewart's low mood was thought about; we talked about what was bothering him, and incorporated it into the music, in the 'Hi, how are you?' activity. Being involved in the playing did seem to help some children feel better, or raise their mood. For example Lucy would sometimes lie on the floor or sit hunched up and be uninvolved, saying 'I'm fed up'. When she could be drawn into the playing, she noticeably brightened and became more interactive with others. In contrast to the aims of the gamelan tutors, one of the aims of the gamelan therapy was to enable the children to explore and think about their feelings. If they felt challenged during the group, for example when they could not play the instrument of their choice or achieve the sounds they were trying to create, a good mood might change to one of anger or frustration. As a therapist, my role was to help them understand these feelings better and find ways to cope with them.

Wellbeing - catharsis

As previously explained, the instruments of this particular gamelan, the Balinese angklung were not particularly large, and could not be struck with force in the manner described by tutors when talking of the cathartic effect of hitting the gongs loudly to express anger, for example. This form of catharsis did not appear to be a feature of this group, although at times the drums were played with some energy and in a manner which suggested a release of emotion, perhaps tension or frustration for example. This theme could be focussed on more in therapy when it was appropriate for the clients involved and with the relevant instruments.

Wellbeing -transformative experience

There was an element of changing behaviour and 'going through blocks' (tutor comment) for a few of the children. For example Simon changed from being one of the 'messing around' group, allied to Stewart, to being my 'helper', fully involved in the playing, leading the drum and tidying up after. Blake was able to be different, moving from being shy and feeling incapable, to becoming confident and quietly assertive. In this respect, I think for some children playing gamelan together could be described as a transformative experience.

Synchronised playing - Group flow

I was not aware of this theme being in evidence during the gamelan therapy sessions. The music we played was not long and repetitive, able to put people into a 'hypnotic state'; it was far more dynamic, with children needing to watch for signals, start and stop playing and so on. Therefore the experience was quite different to that described by gamelan tutors in this theme, where participants were perhaps playing long traditional pieces.

Therapeutic potential.

This sub-theme referred to there being the potential to take the benefits of gamelan playing further in music therapy. This is what the gamelan therapy project explored.

8.6.5 KT5 Sensory range:

Vibrations and timbre - Textures and smells

The sensory aspects of the gamelan impressed most of the children. They were all very taken with the way the bars of the deeper instruments vibrated, how they could hear the sound waves beating, and stop the notes with their fingers. They were also enthusiastic and curious about the different kinds of sounds the instruments made, such as the clashing sound of the ceng-ceng compared to the melody instruments. The gong held a huge appeal, it was the most fought-over instrument, and once sitting at it, most of the children found it very difficult not to keep playing it repeatedly. The gong sound and the way it resonated were enjoyed. As described in the case study, listening to the resonance of the final gong note dying away became a key feature of the group piece, with the children competing over who could hear it the longest.

Isabelle, the only sensory —impaired participant, explored all the instruments through touch as well as listening, and was very specific in her choices of what to play through the instruments' sounds. Interestingly, although the TA thought that she was very sensitive to sound and heard things louder than others, Isabelle played the percussive instruments very loudly, beating them with such force I had to ask her to play quieter on occasions so that we could hear the other instruments.

8.6.6 KT6 Cultural heritage:

Keep link to the culture

Throughout the whole gamelan therapy project I contextualised what we were doing, placing all aspects within the Balinese culture. From the beginning I talked of where it came from, how it was played, what it was played for and so on. Telling the children the names of instruments, showing them photos of Indonesian musicians and dancers, of different gamelan, trying out masks and puppets and looking at a world map were all a part of keeping it linked to the culture. This was an integral part of the group sessions and I felt had a positive effect on the atmosphere. The children were very aware that this was from somewhere else that nobody had ever heard of, it was exotic and interesting. I had the impression they enjoyed learning the names and looking at and talking about new things.

Sense of occasion

This was very evident from the beginning, as shown by the way the children entered the room, their excitement and sense of wonder, and in their anticipation of the sessions beforehand. The sense of occasion lessened as the children became more familiar with the instruments, and the sessions developed from just trying everything out to looking at how to work together, but I think it still remained an important aspect in encouraging engagement.

Etiquette and traditions

This was a very important aspect to the work which set the tone for each session. The ritual of taking shoes off at the beginning of each session became a routine which helped to give a sense of familiarity and safety. The group also created their own rituals, such as taking the instrument covers off in turn, which added to the routines. They readily took on the idea that we needed to respect the instruments, and I was then able to extend this to the idea that we need to respect each other, pointing this out when they were not listening to each other for example. The cultural traditions of respecting and being careful of the instruments and others, not pushing you to the fore and considering the group first, could to some extent be transmitted through the music and how it is played. This was beginning to be shown in the music we created, and may have been more evident if the sessions had continued for longer.

Values and possibilities of traditional music

The concept of traditional gamelan music was used as a basis for all the playing, as described in the case-study, and I found it to be very flexible and adaptable. There was a way for everyone to play within their level of ability. We still managed to maintain something of the character of gamelan music even with all the adaptations, and this contributed to the successful creation of a musical 'piece' each session which gave the children a sense of achievement and satisfaction. The individuality of each child was also maintained within the music; each played in their own way and expressed something of their personalities. As described in chapter two, traditional gamelan music reflects values of Indonesian society, that the community is more important than the individual. In gamelan playing group cohesion is valued over individual expression. This ideal contrasts to some extent to the music therapy approach in which it is important to meet each child 'where they are at' and encourage individual expression. Therefore it is significant that it was possible in this project to use traditional gamelan musical structures whilst still maintaining a therapeutic milieu in which children could express themselves as individuals.

8.7 Summary

In this project, the gamelan was used for short-term music therapy with a group of children with learning disabilities. It was effective as a group therapy activity; group and individual therapeutic needs were addressed through it and aims were partially or fully met. As shown in the discussion section, the Key themes applied to differing extents. From evaluating the themes in relation to the music therapy group, the most applicable to music therapy and relevant to the effectiveness of the project were:

Accessibility: it accommodated the different abilities of group members, playing styles, beaters and instruments positions could be usefully adapted, and the pentatonic tuning was easy to understand and use by the children. This was particularly successful for the children who were less confident in their abilities.

Engagement: the look, sounds and physicality of the instruments encouraged and sustained participation by the children. They frequently showed enjoyment of it and were excited in anticipation of the group happening each week. They appreciated the fact that they were all beginning at the same level of experience and ability, and in particular how this enabled the equal participation by their teaching assistants.

Offers group-work possibilities: many group therapy aims were addressed through the gamelan project. These included development of communication skills, listening to and thinking about each other, learning about the effect of their behaviour on other people. The group structure could be flexible, to encompass focus on an individual, or on the group as a whole, and as a therapist it was possible to work with the group dynamic through the gamelan playing. It was also possible to incorporate other music therapy group activities (such as the opening 'Hi, how are you?' activity) into the group structure, and link it to gamelan music. Sensory range: there was considerable response to the sensory aspects of the instruments, in particular timbre and vibrations, which encouraged engagement, enthusiasm and enjoyment.

Cultural heritage: links to the culture, playing etiquette and related arts forms were all part of the group process which participants responded to. They had a positive effect on the group, and new rituals began to be created. The use of traditional music as a basis for playing was a major aspect of the group, which both engaged the children and provided a very flexible and adaptable structure for playing.

As the whole project was a therapy project, it is difficult to relate the Key theme of 'Therapeutic effects' to the project as separate theme. However, the sub-theme of 'mood change' was a relevant aspect addressed in the group through being attentive to the feelings and emotions of participants. Behaviour did change progressively with some elements of 'transformation' and as already stated, and many therapeutic aims were achieved for individuals and for the group as a whole.

In contrast to the work described by gamelan tutors, as music therapist, I was viewing everything that happened in the room as significant and part of the therapeutic material of the group. In addition to the music created, how the children approached the instruments, how they related to each other when not playing as well as within the music, and what they chose to talk about were all relevant features of the work. This gave the 'extra-musical features' of the gamelan, the etiquette, rituals and cultural aspects a context and significance within the therapy. Whether they chose to take their shoes off, how they treated the instruments, stepping over or not, and whether they were able to accept an equal place in the music regardless of their part, were all relevant aspects to be worked with.

The Procedural themes had relevance for the setting up and running of the gamelan therapy project, as described in 8.3.1. Of particular relevance were the group size and length of the project. Whilst tutors tended to work with larger groups, for some of the children in the therapy group the size was too large. In order to work therapeutically with these participants, a smaller group could be

more effective. The period of eight weeks could also have been extended to provide more development of the therapeutic aims. Several of the musical structures and techniques listed in the Procedural themes, such as using an eight-beat cycle and using the traditional roles of instruments in improvising, were used for the therapy group. These proved useful and would benefit from being explored and developed further. The combining of media such as puppets, masks and story-telling with the music, was touched upon, and also showed the potential to be explored and utilised further.

The Tutor themes matched on to my experience in some respects, notably in terms of own experience of playing and training to teach. In contrast I have much more experience and training to work with this client group and to work with therapeutic aims. The relevance of this will be discussed in the overarching analysis in the following chapter.

In conclusion, the school gamelan therapy project showed that playing one form of gamelan (Balinese Angklung) could be a therapeutic activity, when constructed as a music therapy intervention by a music therapist with participants referred for therapy. The participants had individual and group needs, for which therapy aims were formulated. Gamelan playing was used and adapted to address these aims, which were partially or fully met.

In the following chapter, the outcomes of the gamelan therapy project are taken into the overarching data analysis, together with the themes and ideas from all aspects of the overall study to consider together, and to develop the principles and guidelines for using gamelan in music therapy.

Chapter 9. Synthesis of data and development of principles for the use of gamelan in music therapy.

In this chapter I will bring together the themes and ideas from the data analysis of all sections of the study; the literature, research studies, semi-structured interview analysis and school project, to address the main research question: 'What does the playing of gamelan music have to offer the practice of music therapy?' Having addressed this question, I further use the data synthesis to propose some guiding principles for the use of gamelan in music therapy practice. Thus there are two parts to the chapter; the data synthesis and the consideration of how gamelan can be used in music therapy practice.

9.1 Data synthesis

In this part of the study, the qualities and features of gamelan music and playing which have relevance for therapeutic use and which were identified in the ethnomusicology literature, literature about gamelan playing in the West and from research studies have been reviewed and considered together with the themes identified through the analysis of the semi-structured interviews, and with the outcomes of the school project. By reviewing all of these aspects, comparing and combining ideas, the specific features of gamelan music which are relevant to music therapy practice have been defined. This list of features represents the main research findings of the study which answer the research question, 'What does the playing of gamelan music have to offer the practice of music therapy?' I will now list these features, describe their relevance to music therapy and show where in the data they have come from.

9.1.2 Features of gamelan playing relevant to music therapy

This list is not presented in a hierarchical order, however, the first two features could be considered the most fundamental; for therapeutic interactions to take place, clients need to be motivated to engage in playing and to be able to do so. Gamelan playing can fulfil these requirements.

Gamelan playing offers a musical environment and experience which:

- a) clients will want to participate in
- b) clients will be able to participate in
- c) has a cultural heritage which is useful for participants and therapy
- d) is naturally a group-playing activity
- e) is multi-sensory
- f) offers a range of musical pieces and styles of different levels of complexity
- g) offers music which can be adapted and simplified
- h) is a resource for improvisation and composition
- i) has unique sounds and timbres
- j) can develop a wide range of communication skills amongst participants
- k) can improve self-confidence, self-esteem and give clients a sense of satisfaction
- l) can improve mood and general well-being
- m) can develop a sense of community amongst participants

These features will now be described individually.

Gamelan playing offers a musical environment and experience which:

a) clients will want to participate in

For clients to take part in music therapy they need to want to take part. It may be necessary to attract and encourage clients to attend and then participate in therapy. This feature was noted particularly strongly in the interview analysis theme of 'encourages engagement' in which sub-themes included the visual appeal of the instruments, the importance of the value of the instruments, the interesting sounds and music, the physicality and containing aspects of the instruments, and the novelty of the ensemble which meant that most participants approached it at the same level of experience, so were unlikely to feel intimidated by others' ability to play better. Several of these aspects were also found in literature on gamelan in the west. Some gamelan tutor reports mentioned the 'level playing field' and the excitement generated from seeing the instruments as important aspects for engaging participants. This finding was supported in the school project. It was also noted that some participants were more interested and involved in the gamelan playing than in other musical activities, suggesting that gamelan can engage some people in different ways to other musical instruments, or music. The pentatonic tuning of the instruments, which means that the sounds are pleasant and 'in tune' straight away was identified in tutor reports, research literature and the interview analysis as important in encouraging people to continue playing, feeling able to do so, and in giving them positive aural feedback for their efforts.

b) clients will be able to participate in

The procedural themes from the interview analysis and the results of the mapping exercise show that gamelan can be effectively used with a wide range of children and adults of all ages who have particular needs or disabilities. The feature of gamelan that the instruments are physically easy to play was identified in gamelan literature of the West, in its use in education for non-disabled children, and with families and adults as well as in much of the literature on gamelan use with people with disabilities. This was one of the reasons why gamelan was chosen to use as a musical activity with these groups. It was also an outcome in the interview analysis in the theme 'accessibility'. The interview analysis revealed that the accessibility of gamelan is more than just the ease with which sounds can be made, as discussed in chapter 7, and much of this detail is relevant to music therapy use. In addition to being simple to play, it is immediately clear or simple to work out how to play most of the instruments; a range of playing styles can be used and adaptations can be made to enable people with different disabilities to play instruments. A wide range of sounds are available and different playing actions required, making it an interesting and varied musical resource, a flexibility which is useful to music therapy. Several reports of special needs' work listed the ability to work with mixed ability groups as an important characteristic of the gamelan, also relevant to music therapy groups. Looking at the ethnomusicology literature, Brinner (1995) also notes that Javanese gamelan is a very inclusive tradition of music due to its accommodating a wide range of playing abilities, a feature endorsed in the interview analysis. The school project conducted by the author was able to work with children with a range of abilities.

c) has a cultural heritage which is useful for participants and therapy

The relevance of cultural heritage was identified as a theme in the interview analysis and also in the literature and research projects examined, particularly in the work undertaken in prison settings. As shown in the ethnomusicology literature review, gamelan music conveys much of the values and societal ideals of the culture from which it comes. Brinner (1995) notes how both Javanese and Balinese gamelan music require community cooperation and harmony in the interactive musical exchanges, which are important aspects of the society. Many of these values could be relevant in a therapy context and would be conveyed through the playing of traditional pieces, or simplified versions of them. The concepts of working as a group, helping each other and not standing out as an individual are important in both Indonesian society and in the music. These concepts can be relevant to music therapy. Of relevance also is the concept of Rasa, discussed in Chapter 2, the affect, mood or feeling conveyed in both the playing of and listening to gamelan music (Benamou, 2010).

The cultural aspect of gamelan playing that in general it does not permit individual free expression could be contrary to the therapeutic aims and could be seen as a disadvantage. However, a finding of the school project was that it was possible to both allow and explore individual expression in gamelan therapy sessions through adapting and combining music therapy techniques with gamelan playing structures. This is also supported in discussions of the instruments by Walton (2007) who writes: The instruments in the gamelan are highly individual in timbre, range, rhythmic density and style, and the aim in ensemble playing is not a fusion of sounds, but the capacity for each instrument to retain its individuality in a group.' (Walton, 2007, p.37)

In addition, the rituals surrounding gamelan playing were an important aspect identified by several gamelan tutors, both in the literature and the interview analysis, and endorsed in the school project. Whilst contributing to a sense of occasion for the playing, they too conveyed the values of respect, taking care and giving things worth, which were relevant to the participants and the therapeutic benefit of the sessions.

The overall experience of playing something from a very different culture had an effect on participants as encapsulated in the 'sense of occasion' sub-theme from the interview analysis and this contributed to the positive responses reported by participants.

d) is naturally a group-playing activity

As shown in the ethnomusicology literature, gamelan is inherently group music, and as such reflects the communal and cooperative nature of society in Indonesia. The majority of literature on gamelan use with special needs groups in the West, and research projects undertaken describe work undertaken with groups. The possibility for group-work was a theme from the interview analysis, which identified several more specific features of the music which could be used for groups. As an inherently group-based music, in both the musical structure and set of instruments, it therefore is highly suited to group music therapy. Gamelan provides a ready-made set of instruments which fit together and musical structures in the traditional music, which could be used for a range of music therapy approaches. A strong finding was that music therapy approaches which utilise the group interactions and dynamic in the therapeutic process could be applied within the playing of traditional pieces. The interview analysis, and school project, showed that there are parallels between the musical roles undertaken in traditional pieces and the ways group roles can be thought about in group music therapy. There is potential to explore this in a therapeutic context further, particularly with reference to Group Analytic Theory (Foulkes, 1975). The interview analysis showed that for some work, mainly that undertaken in prisons, the group-playing aspects of the music were utilised to focus on non-musical skills such as listening to each other and working as a team. In the school project, simplified musical ideas from traditional music were used to create a group dynamic through which issues relevant to both the group and individuals could be addressed. Whilst most of the gamelan work investigated was in groups, there were some

exceptions, mainly identified in the interview analysis, which could be potentially developed in music therapy practice. These were developing responses and interactions on a 1:1 basis with individuals who had severe multiple learning and sensory disabilities, and family work, such as that undertaken in prisons on family visit days.

e) is multi-sensory

Various aspects of the study emphasised different sensory qualities of the gamelan. The unique sounds of the instruments were identified in the ethnomusicology literature, in particular the beating created by the pair-tuning of Balinese instruments, thought to have a beneficial effect on listeners in addition to being aesthetically pleasing. The overall qualities of the sounds were identified as being beneficial, (calming and relaxing) in gamelan tutor reports, and as a sub-theme in the interview analysis. The resonances of the instruments were found to be vital for people with hearing impairments, as they allowed participants to experience the sounds in different ways, through their bodies and through touch. This impacted on accessibility, in that it gave a way for people with hearing impairments to be able to participate in the music. The visual impact of the instruments, colours and decorations, as well as the tactile qualities of the materials and carvings were all identified in literature on gamelan in the West and in the interview analysis as important aspects for engaging participants with sensory as well as learning disabilities, for example. All these aspects have relevance for music therapy in general, and particularly when working with clients with sensory impairments and/or cognitive impairments.

f) offers a range of musical pieces and styles of different levels of complexity As already discussed under point (d), traditional gamelan music is group-based. The repertoire is huge and varied, with many different styles of piece in both Javanese and Balinese music. The music usually accompanies a theatrical or spiritual event and pieces have different emotional or mood qualities to them, relating to what is being conveyed in these events. Some ethnomusicology literature (Becker, 2011, in Juslin and Sloboda) suggests that one of the functions of gamelan music and its associated dramatic event such as a dance or puppet show is for the expression of strong emotions not normally allowed in society, such as rage. Research by Natalia (2002) suggests that specific styles of gamelan music have qualities which could improve the sleep patterns of new-born babies. Walton (2007) discusses how gamelan pieces can be categorised by their Rasa; there can be 'sad pieces, exuberant pieces, flirtatious pieces and so forth' (Walton, 2007, p.35). This aspect of the music could be utilised in music therapy practice; specific pieces could be selected to help the group convey or explore particular emotions or dynamic qualities, as indicated by the therapeutic need. The choice of pieces according to their Rasa would however require further exploration, as the feelings assigned to pieces in Indonesia would not necessarily be recognised in the same way by non-Indonesian participants. The range of complexities of the repertoire,

and different levels of skill needed to play pieces, some being very straightforward and other music more complex, means that there will usually be pieces available in the different styles which can still be played by those with limited abilities or experience. The use of simple traditional pieces was noted by several gamelan tutors in their work. The different sets of instruments were also noted in the interview analysis procedural themes as offering different qualities, for example the central Javanese being smooth and sonorous whereas Balinese Gong Kebyar is considered more brash, fast and excitable. These could be selected intentionally for music therapy where the style of gamelan is chosen which best fits the type of therapy work or clients.

g) offers music which can be adapted and simplified

Whilst the music has a range of styles and complexities, as discussed above, it shares a number of basic structural elements, to which the music can be reduced as a basis for group music making, or for making adaptations or simplifications where needed. This feature was noted in the interview analysis, which showed in detail how this could be achieved, and how it contributed to the accessibility and inclusivity of the gamelan. It was also noted in gamelan tutor reports and literature as being widely used. Additionally, it was noted that this simplification could be achieved whilst still maintaining the spirit of traditional gamelan, which was viewed as valuable. For music therapy practice, simplified traditional music and musical elements could be useful for participants of differing ability levels. This was utilised effectively for the school project, in which elements of traditional music, such as repeated cycles and structural gongs were used to create the group music, which still retained a Balinese feel to it.

The musical adaptations used by gamelan tutors relate to Spiller's 'Four Musical Layers in Modern Gamelan Music' (Spiller, 2008): the underlying cycle, rhythmic control / drumming, the main melody and the elaboration. These could be usefully considered for simplifying parts for music therapy groups.

h) is a resource for improvisation and composition

Literature on gamelan in the West showed that the music has influenced some Western composers, who have used elements of it to varying degrees within some of their compositions. Within special needs work, in addition to using traditional compositions and styles, the gamelan has been used as a resource for improvisation and composition, as evidenced in both gamelan tutor reports and the interview analysis. Improvisation can be free or use structures, including those taken from traditional music. The gamelan was found to be effective for this due to the sounds fitting together and the range of sound qualities available. As much music therapy practice incorporates or is focussed upon improvisation, the gamelan would be a suitable ensemble for improvisational music therapy. Group composing was found to be effective in developing communication skills in prison work and could be useful for music therapy practices which use composition.

i) has unique sounds and timbres

In addition to the sensory qualities discussed in point (e), the unique or special sound of the gamelan was noted in much of the gamelan tutor literature and the interview analysis as being of value to participants. This was found to contribute to participants' engagement with and enjoyment of playing, and to have a positive effect on their mood. Whilst it is difficult to specify or measure this, I would suggest that this is a combination of the sound qualities of the different instruments, such as that from striking bronze bars, the reverberations of the many tuned gongs, the particular drum qualities and other unusual resonances which are all different to western instruments or school percussion. Additionally, the tuning is familiar enough to be understandable, but 'mistuned' enough from the western scale to feel different and interesting.

j) can develop a wide range of communication skills amongst participants The research studies, the interview analysis and tutor reports all identified that the way traditional music works and is played can enable the development of a range of communication skills in participants. The interview analysis identified that the particular aspects of the music, such as there being no conductor and the interrelatedness of the parts all required listening and waiting, timing of responses, good attention and concentration. Research studies showed that gamelan playing improved general communication skills in adults with learning disabilities due to the need to focus on the non-verbal aspects of communication, and the combination of social and musical variables, and that it could help to develop joint attention. (MacDonald and Miell, 2002). The development of communication skills is a frequent aim for music therapy work. k) can improve self-confidence, self-esteem and give participants a sense of satisfaction

This feature was identified in the gamelan reports literature, research studies and the interview analysis. Because of the accessibility of the instruments and the music, and the sonorous tuning, participants could have a successful experience of playing quite quickly. The adaptability of the music enabled them to experience being able and musical, which was reported to boost self-esteem and increase selfconfidence. Self-esteem due to improvement in musical skills was also reported in research studies. Participants reported feeling proud of what they had achieved. This finding was backed up in the school project, where pupils who were very under-confident and anxious in other areas found they could play well, received positive feedback for this and showed increased confidence and self-esteem. These are frequently found aims within music therapy.

l) can improve mood and general well-being

Several tutors in the interview analysis reported this as a feature which they found from their own playing, as shown in the tutor themes, in addition to noticing it with participants of their workshops. The interview analysis identified the features of communal activity and group 'flow' contributing to a feeling of well-being. Further sub-themes identified were the cathartic nature of playing music, a release of tensions and its transporting qualities as elements which improved mood. These features may be relevant for many music therapy settings, in which low mood amongst participants is present. Within the procedural themes a range of aims and benefits which could result from playing were identified. Many of these were relevant to music therapy and could be focussed on intentionally within the therapy. There is the potential when using gamelan as a therapeutic intervention to build on these and develop further benefits to playing.

m) can develop a sense of community amongst participants

The notion of community features strongly in the ethnomusicology literature, as described in point (c), as music of the community. The interview analysis revealed a sub-theme that the music is 'community generative'. In several settings the gamelan was used with an existing community, such as people who lived together in a prison, or a residential school, in part to help develop their sense of community and ability to work together. The egalitarian and inclusive aspects of the gamelan allowed all members of the community, such as staff, prison officers and carers to be included in this community playing. This was a feature in the school project, where an existing 'community', a form- group, was selected specifically to help them work better together and to develop their relationships with each other, and in which the teaching assistants could also participate. In a community music therapy approach, the gamelan could be used to develop a community, as a way for people to come together through an accessible, non-hierarchical musical activity.

To summarise, these features demonstrate that gamelan playing provides a musical environment which facilitates interactions that can have therapeutic meaning and purpose. It can offer a 'means of relating within a therapeutic relationship' (BAMT 2013). This leads to the consideration of how gamelan can be used in clinical music therapy practice.

9.2 Principles for the use of gamelan in music therapy

Having demonstrated that gamelan playing has specific features which can be used for music therapy, I have used this data synthesis and my experience as a music therapist to develop a set of guidelines or general principles for the use of gamelan in clinical music therapy practice. Whilst these principles have been generated through this study, further continued use of gamelan in music therapy practice is likely to generate more principles and possibilities for use.

First I will address two key aspects of music therapy practice in the context of using gamelan in music therapy; the skills and experience of the music therapist and the nature of the therapeutic relationship between therapist and client(s). I will demonstrate how the data analysis informed their consideration in this context.

9.2.1. The music therapist

The tutor themes demonstrated the relationship between the tutors' own experience and relationship to gamelan music and the way they used it with different participants. This suggests that similarly, the gamelan experience of a music therapist using it would affect their ability to use it in therapy work. Just as a music therapist needs to be trained and experienced on the music they use, their

'first study' instrument, accompanying instruments such as guitar and keyboard, and various percussion in order to use them spontaneously and flexibly in therapy, so a music therapist using gamelan would need to be experienced in playing the instruments they are using and in the traditional music. This gives her/him a bank of musical ideas to draw from and ways of responding musically, in the style of gamelan music. This was evidenced in the school project; whilst I prepared simplified musical ideas from traditional gamelan to use in the sessions I frequently needed to adapt these in the moment in response to different children's needs and the way the music and the therapeutic process was developing. This required a good understanding of the music that I could draw from intuitively. The tutor themes also noted that gamelan learning was more effective when it was linked to its cultural heritage. Being taught by a tutor who treated it as simply a set of instruments removed from its context was experienced more negatively than when this was included. Both the literature of gamelan and special needs and the interview analysis theme 'Cultural Heritage' emphasised the importance of conveying the cultural aspects of the gamelan. As found in the school project, this was an important aspect of the music therapy, and therefore suggests that the music therapist needs to be familiar with these aspects and include them in the therapeutic setting. Cultural heritage can be transmitted through the music therapist's approach to the music and the instruments, how they conduct the session and the playing, the rituals and etiquette used, and the way the instruments are respected.

9.2.2 The therapeutic relationship

In music therapy the relationship between therapist and client(s) is of central importance to the therapeutic process. A therapeutic relationship is established, through the use of music in both individual and group setting, as described in Bruscia's 'Working Definition' of music therapy:

'Music therapy is a systematic process of intervention wherein the therapist helps the client to promote health, using music experiences and the relationships that develop through them as dynamic forces of change.' (Bruscia, 1998 p.20)

The relationship between gamelan tutors and participants was not identified as a theme in the interview analysis. One research paper (Digard, von Sponeck and

Liebling, 2007) did suggest that the personal style of the workshop facilitators appeared to be the key element of the therapeutic effects of the workshop, which comes nearest to the idea of relationship. In contrast therefore to the majority of tutors, a music therapist will be attending to the nature and development of her/his relationship with the clients, and viewing this as key to the therapeutic process, a dynamic not identified in this study in gamelan workshops run by gamelan tutors. Given that the primary aims of the gamelan work identified in the interview analysis and listed in Procedural Themes were not therapeutic, this is not necessarily unexpected. However, as previously discussed, therapeutic benefits of gamelan playing were identified through the study of tutors, and this suggests that a music therapist who is using the gamelan for primarily therapeutic purposes and using music therapy methods within the context of a therapeutic relationship will be able to use and develop these identified therapeutic aspects further. In a psychodynamic approach to therapy, the therapist acts as a container (Bion, 1962) to receive the client's projections, digest them, and give them back in a more manageable form. This dynamic is also enacted through the musical interactions of the therapist and clients, particularly in a more improvisation-based psychodynamic approach. When using gamelan, the containing function of the music therapist can continue, however, the structure of the traditional music can also provide a holding environment (Winnicott 1965), in which the client's emotions can be safely contained within the music. This was evidenced at times in the school project, where for example my role as therapist was to receive Stewart's negative feelings and frustrations. When I incorporated this into the musical repeating structure of the drumming and acknowledged his emotions in a more light-hearted way, he was able to relax and laugh, able to bear them himself, and for a short while following, was able to let himself participate in the group in a positive manner.

9.2.3 Principles for the use of gamelan in music therapy practice

I will now outline the general principles for using gamelan in music therapy, developed from the data analysis and using my experience as a music therapist.

Principle 1: Music Therapy setting Gamelan can be used for:

- Group therapy with a range of clients
- Community work (building and development)
- Family work (and similar staff/patient relationships)
- Individual/small group therapy for people with complex or profound learning disabilities, and/or with sensory impairments

Principle 2: The instruments

Different sets of gamelan, usually Javanese, Balinese and Sundanese can all be used for music therapy, although certain sets are more appropriate for certain therapeutic aims, client groups and therapy activities. If possible, the set used can be chosen according to the work being undertaken. In general the set of instruments should be kept together and played as a whole. In individual/small group sensory work specific instruments should be chosen to use, according to the client's need and clinical appropriateness.

The instruments and beaters used to play them with can be adapted in a range of ways to accommodate clients' needs. This can include changing the position of instruments by raising them onto tables, removing bars, using different beaters and playing styles.

Principle 3: The Music

Five main ways of structuring gamelan playing are available which form a continuum:

- Traditional gamelan piece with range of complexity and levels of sophistication available to use
- Simplified traditional piece, e.g. repeating one line, using more gongs, outline melody only
- Improvisation or creation of a piece using simple gamelan structures and elements, such as cycles or interlocking parts
- Improvisation using the traditional musical roles of the instruments
- Free improvisation gamelan instruments used as a sound resource

Structures can be chosen to best suit the therapeutic aims of the work, and the clients being worked with. More than one playing structure can be used in one setting or session and the work can move between different structures according to therapeutic need at the time.

Principle 4: Client groups

There is the potential to use gamelan with many client groups for whom music therapy has been indicated; suitable adaptations should be considered and implemented to enable participation. Client groups include:

- Adults with mental health difficulties
- Children and adults with learning disabilities
- Adult and young offenders
- Children and adults with physical disabilities including wheel-chair users
- Children and adults with hearing or visual impairments
- Families
- Community groups

Principle 5: Therapeutic aims

Whilst there may be a range of therapeutic aims in clinical work, those which can specifically be addressed through gamelan use include:

- developing communication and social skills
- building interpersonal relationships
- learning how to be with other people
- increasing understanding and tolerance of others
- enabling self-expression
- increasing self-awareness
- developing self-confidence
- improving self-esteem
- raising mood
- relaxation
- sensory awareness

Principle 6: The Music Therapist

The music therapist should have sufficient experience of playing gamelan to be able to use it flexibly, and sufficient understanding of the associated culture and context of gamelan playing to be able to convey the essence of this within the sessions.

Principle 7: Culture

The culture and heritage from which the gamelan comes should be retained and communicated in clinically appropriate ways.

Principle 8: Limitations/contraindications:

Gamelan may not be an appropriate music to use in certain situations, to which the music therapist should be alert, such as with clients who:

- find it too 'foreign' and have negative attitudes to foreign cultures
- find it too different and irrelevant to them and their lives
- dislike the music and sounds
- have hearing impairments which result in the sounds being experienced as too overwhelming or painful, such as those with cochlear implants

These principles are proposed as guidelines to be used by music therapists considering using gamelan as a music therapy practice.

9.3 Possible applications for the use of gamelan in music therapy practice

Using the outcomes from the overarching data analysis, the principles for practice and my expertise and experience as a music therapist, I will now suggest some possible applications for the use of gamelan in music therapy practice in more detail.

Group therapy approaches

Group music therapy offers an environment for clients to feel connected to each other. Davies and Richards (2002) assert that disability can lead to feelings of alienation and isolation from others, and that taking part in a therapy group 'may help to bring awareness that disability is not so much in the individual but a problem between one person and another and thus a shared responsibility.' (Davies and Richards, 2002, p.22). They discuss how shared improvised music in psychodynamic music therapy can be a way for people to explore how they experience themselves in relation to others: 'there is a particular sense of belonging when a musical improvisation is shared in a group where the instruments and many voices of sound seek a place to be alongside each other, affecting or resonating with each other rather than being indifferent. Here the uniqueness of the individual sound or instruments makes up the meaning of the whole.' (Davies and Richards, 2002, p.23). Gamelan instruments could be used for this kind of free improvisation, and may add something particular to the sense of connectedness and mutual resonance through the ways the instruments themselves are related to each other through scale and sound, naturally forming 'one instrument'. Playing traditional pieces could also offer this experience, as discussed earlier.

When working with more verbal adults clients, such as adults with mental health difficulties or moderate learning difficulties, different group roles could be explored. A music therapist using a group analytic approach (Foulkes, 1975) could frame the gamelan playing within this. Participants could begin playing at an instrument they feel comfortable with for one piece, and then swap to another, as is the usual practice in traditional gamelan playing, but in therapy this could be to experiment with taking on different roles. Their experiences at different instruments can be thought about and addressed deliberately as part of the therapy work. People can discuss how it felt, for example, being the drummer leading the tempo of the group, or the jegog player (bass instrument) playing only a few notes slowly in the background whilst other people's' playing was much more to the fore. They can compare this to the roles they take in life; it could be a useful way to access these feelings for them. For example, to be the leader, and have the whole group follow your speed-up could be empowering or frightening; someone may struggle with it if they are not used to being listened to. This may relate to their experience in their family, or in social situations. A music therapist would be able to work with these dynamics, but would need to be familiar and at ease with the gamelan music, as previously discussed.

The different roles of the instruments can also be used with children with learning disabilities. A key concept of music therapy is to meet the person 'where they are at', to try to connect with them at their level. The gamelan can offer a way to meet each person musically, through the different instruments and ways of playing and parts available. The music therapist, through trying different traditionally-based musical ideas out with participants can assess individuals and find a part for them to play which matches their abilities, and enables them to be part of the group music making, at a level at which they can be successful. This idea was useful in the school project. For example, Isabelle was very anxious initially, and not willing to freely try out the melody instruments with the other group members. However, I quickly noticed that she played in a strong beat, so switched her to a single toned instrument which traditionally keeps the beat, at which she excelled and was able to be an integral part of the music. Following this I noticed she was counting, so gave her the part of the gong player, who needed to play on every eighth beat. This was an example of taking a strength of hers and using it to enable her to connect with the rest of the group in the music. Further parts were used to first match her abilities, and then extended to help her develop further.

The continuum of gamelan structures identified in this study for use in music therapy is analogous with Darnley-Smith's diagram of 'Continuum of musical structures to be found in music therapy' (Darnley-Smith & Patey, 2003 p.80) This framework moves from 'Tightly structured music' which is therapist directed, through 'improvisation with structures' which is partly therapist directed to 'free improvisation' which is client directed. Darnley-Smith points out that a client's need for structure in music therapy is variable and relates to their emotional and psychological state. Moving along the gamelan playing continuum could offer the flexibility needed for clients to find a way of playing which meets their or the group's needs at the time. Free improvisation can be very overwhelming; being asked to 'play anything you want' as is sometimes suggested in music therapy, can provoke considerable anxiety. The gamelan offers ways of playing using specific structures, different to western music and diatonic harmony, which can be simple enough to help the client feel secure and confident in their abilities, so that they can later explore more free or complex ways of playing. This changing use of structure is an integral part of the therapeutic process. A key difference to Darnley-Smith's model is that of the role of the therapist. As the leader within

gamelan music is less defined, as previously explained, the therapist may not need to be so obviously 'in-charge'; structured music would not necessarily be 'therapist directed' as in Darnley-Smith's model. Other participants can take responsibility and leading roles can be more equally shared in gamelan-based music therapy. Leadership roles and responsibilities in gamelan playing are discussed in more detail by Caballero (2010) in relation to prison projects, within which, he claims, the ways leadership and authority are experienced are crucial elements in its effective use. This is an area which could be explored further in music therapy practice with gamelan.

9.4 Situating gamelan within music therapy theory and practice

This study has identified a wide range of features of gamelan which have relevance to music therapy practice. They are unlikely to all be applicable to all approaches or models of music therapy; some features will have more relevance than others. It is not possible therefore to situate gamelan playing within only one particular model or theory of music therapy. I will now consider some of the main theories and make suggestions for how music therapy which uses gamelan playing is placed within these.

The terms, 'model', 'theory' and 'approach' are often used interchangeably in writing about music therapy (Wigram, Pedersen and Bonde, 2002) and this is reflected in the literature used for this discussion. Music therapy theory is constantly evolving; existing theories and models are modified and new approaches are being identified. Five main 'internationally known models of music therapy' were presented at the 9th World Congress of Music therapy in 1999. These were Analytical Music Therapy (Mary Priestley), Creative Music Therapy (Nordoff and Robbins) Guided Imagery in Music (Helen Bonny), Benenzon Music Therapy (Ronaldo Benenzon) and Behavioural Music Therapy (Clifford Madsen), (Wigram, Pedersen and Bonde, 2002). Wigram, Pederson and Bonde argue that Juliette Alvin's Free Improvisation Therapy should also be include in the list of main models, representing an early model which had been highly influential in the development of music therapy in the UK. Psychodynamic and Improvisational approaches.

Alvin, and Priestley's models both use free and theme-based improvisation to a large extent. Whilst Priestley's model is not widely practised in the UK, this approach together with Alvin's have led to a general approach known as 'psychoanalytically informed music therapy' (Darnley-Smith and Patey, 2003, p.29) or psychodynamic music therapy, which is one of the main music therapy approaches taught and practised in the UK. Playing gamelan instruments could fit within this psychodynamic free-improvisation model; the gamelan instruments would be used as the sound source, just as the range of instruments in a traditional music therapy setting would be; however this may be experienced differently, as the instruments are so obviously related to each other. Whilst free or theme based improvisation is fundamental to this approach, songs, pre-composed music and other musical activities are also used at times, their inclusion being seen as clinically-directed rather than following a pre-set plan. Interpretations of group and individual dynamics and behaviour could be linked to the roles and instruments chosen within the music. Within this model, gamelan pieces, or musical structures may also have a place.

Music-centred approaches

Structured gamelan playing could have something to offer music therapy approaches which use structured group playing. The gamelan may have a place within a 'Music-Centred' model (Aigen, 2005) in addition to an aesthetic model (Lee, 2003) in which the nature of the music being used in the therapy is of primary importance as the music is seen as the main agent for change within the therapeutic process. More research is needed to explore how gamelan would work within this model, but there are indications in the list of features of gamelan given in 9.1.2 that it may have some relevance; for example the effects that the playing of traditional music can have and the effects the instruments sounds and scales can have on participants.

Didactic approaches

Discussing areas of practice, rather than specific theoretical models, Bruscia (1998) identifies six main areas of music therapy practice: didactic, medical, healing, psychotherapeutic, recreational and ecological. (Bruscia, 1998, p.158) A more didactic approach might include learning pieces in a group as a way of learning skills such as listening, keeping in time 'to develop musical knowledge and skills that involve or generalise to non-musical areas of functioning' (Bruscia 1998, p.159). Gamelan playing could be applicable in this approach.

Receptive music therapy

Grocke and Wigram (2007) describe receptive music therapy as a practice which 'encompasses techniques in which the clients is a recipient of the music experience, as distinct from being an active music maker.' (Grocke and Wigram, 2007, p.15). Bruscia (1998) defines receptive music therapy as a practice in which the client 'listens to music and responds to the experience silently, verbally or in another modality,' (Bruscia 1998, p.120). The music can be live or recorded, and in a range of genres and styles. Within receptive music therapy practice there may be a place for gamelan recordings or live performances to be listened to for therapeutic purposes, such as music relaxation or for the range of methods described by Grocke and Wigram as 'imaginal listening'; practices in which clients create either guided or unguided images whilst listening to music. Whilst Grocke and Wigram do not specify gamelan music in their discussion of the selection of music suitable for various receptive methods, a finding from the interview analysis of this study was that for some participants it could be an effective musical genre to use for relaxation, to convey particular moods or for meditative purposes.

Community music therapy

The sense of community is a central aspect to gamelan. The interview analysis identified it as being 'community generative', and therefore suitable to use where there was already a community, such as in prisons. Davies (2007) states that Balinese gamelan 'symbolises both the cosmological and the social orders' and as such is a way of socially organising a community. As already discussed, participants in the west are usually not Balinese or Javanese and will not be aware of these values and meanings of the music, however I have suggested that something of them is inherent in the music, and can be held in the mind of the gamelan-playing music therapist. Gamelan music is not an indigenous music that emerges naturally out of the community in western societies; it is foreign and exotic, and therefore offers very specific qualities and possibilities, different to locally known music. Given its identification as community-building music, it could have relevance within community music therapy models.

As a relatively recent development, definitions of community music therapy vary; a general description is given by Brynjulf Stige, one of its key proponents:

'Community music therapy encourages musical participation and social inclusion, equitable access to resources, and collaborative efforts for health and wellbeing in contemporary societies.' (Stige and Aaro, 2012, p.5).These elements match several of the features of gamelan identified in the over-arching data analysis. Gamelan playing is suited to a community music therapy approach which emphasises the use of group music for health and well-being, music that can work with ability rather than disability, in which the therapist can provide 'inclusive conditions for health-promoting sociocultural participation' (Stige and Aaro, 2012, p.16). As demonstrated, gamelan playing is very inclusive and is accessible to people of all abilities. Performance is often a feature of community music therapy and the gamelan also lends itself well to this aspect. Community music therapy could also be considered the area which has the most overlap with the work a therapeuticallyminded gamelan tutor might be doing. Some gamelan tutors' aims for gamelan sessions are not only musical; they are as music for health, for bringing a group of people together, or developing a community.

Music for Health initiatives are proliferating in many contexts (Ansdell and DeNora, 2012; Stige, 2012), such as in medicine, education and social care, and within the broader context of a general Arts for Health movement. These activities are not necessarily located within music therapy practice; they are found within more general health and well-being settings; however some community music therapy approaches would be situated within this. The concept of 'Health Musicking' was developed by Stige (2012), to describe the processes involved in the relationship between music and health, which take in all forms of music making including music therapy. He defines 'Health Musicking' as 'the appraisal and appropriation of the health affordances of the arena, agents, activities and artefacts of a music practice' (Stige, 2012, p.168). Gamelan playing could fit within a 'Health Musicking' model for the general community with the aims of improving health and well-being through the use of the 'health affordances' or general benefits of playing identified in this study, in addition to having more specific therapeutic aims facilitated by a music therapist.

9.5 Possible clinical settings

In this section I will make some further suggestions for clinical settings in which gamelan playing could have something to offer in music therapy. This is not a comprehensive list, rather ideas formed my clinical experience and from the implications of the data analysis.

Adult mental health settings

There is potential to use the gamelan in both inpatient and out-patient or community settings. Stewart (2002) summarises the key aims of psychodynamic group music therapy with people with chronic mental health difficulties as being to provide consistency and structure, possibilities for nonverbal communication and play, through which relationships can be experienced differently, to be heard and thought about, and to experience 'trust, cohesion and belonging' (Stewart, 2002, p.32). These aims could be applied to many areas of work with people with mental health difficulties and people with learning disabilities. Regular group gamelan playing could be used to address all of these aims, offering a musical structure, the opportunity for shared musical play, ways of relating to others, being listened and reacted to, and providing a group which can develop within it trust and a sense of belonging and ownership.

Inpatient settings

Patients on acute admissions ward are often quite distressed, in differing emotional and psychological states, they may be severely depressed or confused, and are frequently anxious about being on a ward with other unknown people who are also in disturbed states. A regular gamelan session, which because of its accessibility would be open to all, as discussed in the outcomes section, could meet several needs. It could be a way to engage people in a positive and meaningful activity, a way for people to get to know one another on the ward, and it may have a positive effect on mood. It may be calming for people who are feeling aroused or anxious (Javanese gamelan in particular) and could help people to organise their thoughts, in order to play and thereby be able to think more clearly in general. For patients in a psychotic state, gamelan playing could be helpful in reality orientation; the holding features of the music, such as repeated cycles, and the containing aspects of the instruments, may help patients to engage and stay in the present time, in the music. For clients suffering from depression, gamelan playing may not be a place to explore in depth what the depression is about, as in usual music therapy, but it may be a way to engage clients in an activity which brings one in to contact with others, takes the focus of attention from the internal world to the external, and helps clients to dealing with the symptoms of depression, such as lack of motivation and isolation. In addition, it could contribute to the ward life and community. Staff could join in on an equal basis, giving them a different way to interact with their patients, but also something that could be enriching and enjoyable for them.

For work on a rehabilitation unit, the focus could be more on developing general life skills, as addressed through the playing of traditional music. Listening to each other, learning how to negotiate and work together with other people are all important skills needed when returning to life in the community, or in group homes. These were identified as areas which gamelan playing could help with in the prison research literature and interview analysis.

Community settings

Gamelan could be used as music therapy within a specific community, such as a prison, hospital or residential community for adults with mental health or learning difficulties, where the therapeutic need is to help people in their relationships with each other, or to find ways to live together successfully as a group. As gamelan is an inclusive music therapy activity, able and less-abled participants can be involved equally; therefore a community music therapy project aimed at integrating a group of disabled people within their local community could use a gamelan ensemble.

Family work

As has been identified, gamelan can work with people of mixed abilities and ages, and therefore has potential to be used in family work, such as in child and family psychiatry settings where the therapy is addressing the relationships within the family. For example, a child, parents, siblings and therapist could play together using gamelan instruments, either improvising using gamelan structures or playing a modified traditional piece. The components required for this, such as listening to each other, fitting interlocking parts together and responding to others could address therapeutic aims such as helping the family to relate to each other and listen to and respect each other's input. It would be a music with which no one was familiar, which could have the benefit of all family members feeling on an equal footing. As with the interviewee's example of using gamelan within prison visitor days, playing gamelan together is a way for estranged family members to do something meaningful and enjoyable together which allowed them to reconnect to each other. A music therapist would be able to develop this type of engagement and explore the family relationships in more depth, as a way of addressing the therapeutic aims.

Complex/profound disabilities and sensory impairments

There is great potential for gamelan use with children and adults who have sensory impairments. The interview analysis and literature identified this use. Whilst it was not explored greatly in the school project due to the different needs of the children involved, the potential was remarked upon by the staff involved in the project, who all stated they could imagine using it effectively with other children in the school who had more severe disabilities. The instruments themselves have many therapeutic possibilities because of their visual, auditory and tactile qualities, which could be experienced in different ways than some other musical instruments. The sounds of the music can be very satisfying; it is an aesthetic experience. In Indonesian culture the sounds are considered to be 'special' and connected to the spirits; whilst this may not be relevant to western cultures, the interview analysis identified that tutors felt there is 'something about it' that people frequently respond to which could be further explored. The effects of the oscillating the sounds waves and the vibrations on the body could be explored,

Neuro-disability settings

A potential therapeutic use of gamelan is for people with severe neurological impairments who have very limited movements. Music therapy in this clinical area makes use of various music technologies (Magee, 2013). A key aspect of this setting is the need to find ways for people who have severely impaired movements to be able to play instruments, such as through using switches or small body movements. There have been several attempts to produce automated ways of playing gamelan and to create computer programmes to play 'virtual' gamelan which use sampled sounds ('Virtual Javanese Gamelan', Wells Cathedral School; 'Gamelan Mecanique', Cite de la Musique). Also relevant to music therapy are programmes which use computers and robotics to control mechanical beaters which play real instruments, such as the Gamelatron (www.gamelatron.com). Although not yet developed for this purpose, for people with very limited movement, programmes such as this could offer the possibility for them to be able to play all the instruments of the gamelan by using touching pads or switches. In addition to giving people with neurological and physical impairments access to gamelan for musical aims, it could be explored for therapeutic purposes where music therapy is indicated for these clients. Finding ways to play gamelan through the use of electronic techniques could give people with limited movements access to gamelan playing, which then allows them to take part in music therapy sessions which use gamelan. Specific benefits, such as being able to make a large noise through a very small movement could also be beneficial. The possibilities for using sampled or mechanical gamelan in music therapy require further investigation.

9.6 Summary

This chapter has brought together all aspects of the study to consider the topic of the research: the relevance of gamelan music to music therapy practice. Firstly, all data produced has been synthesised to identify the main features of gamelan that have relevance to music therapy practice. These are listed and described. Secondly, these features are used to create a set of guiding principles for the use of gamelan in music therapy. Some possible applications and settings for gamelan in music therapy are suggested and described. Consideration is also given to how these applications fit within music therapy theory and recognised models.

In the final chapter of the study which follows I will review the original aims of the research and consider how these have been met, reflect on the limitations of the study and make suggestions for further research.

Chapter 10. Summary and Conclusion

This study set out to investigate the relevance of gamelan music to the practice of music therapy. I identified that gamelan was being increasingly used with children and adults who had special needs or lived in special environments and that there was no clear theoretical underpinning for this work. Whilst most of this work appears to be undertaken in an educational or recreational context, some literature pointed to therapeutic benefits of particular pieces of work. As a music therapist I felt it would be productive to investigate these claims in order to gain a better understanding of what these therapeutic benefits were, as they may be relevant to music therapy practice. In addition, I became aware of links between my own work as a music therapy practitioner and my playing in gamelan groups. This suggested to me that a study of the therapeutic possibilities of gamelan music could offer new knowledge for music therapy theory and practice.

10.1 Summary of thesis

The main research question asked was:

'What does the playing of gamelan music have to offer the practice of music therapy?

In order to investigate this, I proposed two sub-questions. Firstly I asked 'What are the therapeutic benefits of gamelan playing for people with special needs?' Having identified these, the second sub-question: 'How can music therapists use these benefits in clinical work?' sought to link these therapeutic benefits to clinical practice by reviewing them in relation to music therapy practice. As a further exploration into this a gamelan music therapy project was undertaken which incorporated some of these clinical ideas. Finally the data from all parts of the study were combined and refined to generate a list of the most significant features of gamelan playing which are relevant and of use to music therapy practice, and which provided an answer to the main research questions. These were then used to create a set of guiding principles for the use of gamelan in music therapy.

The gap in knowledge which I identified and sought to address is a clear understanding of how the playing of gamelan music can have therapeutic benefits or effects. This relates to the first sub-question, 'What are the therapeutic benefits of gamelan playing for people with special needs?' This question was addressed first through a review of literature about gamelan in Indonesia and in the West and through reports and research studies about gamelan with special needs groups and populations. The research question was kept in mind whilst reviewing this literature and aspects which might have relevance for music therapy practice were highlighted.

Chapter 2 looked at gamelan in its original setting and explored its place in Indonesian society and culture. This showed how societal values such as community and cooperation are reflected in how the music is structured and played. The specific characteristics of the instruments and music which could have relevance to music therapy practice were identified; the group nature of the music, the relative simplicity of the instruments, the pre-tuned scales and the repetitive and cyclical nature of the music.

Chapter 3 looked at the development of gamelan playing in western societies and reflected on its popularity and proliferation. It has inspired many western composers who have incorporated elements of the music within their compositions to varying degrees, some noting the richness and complexity of the music as inspiring them. Gamelan has also been utilised in educational settings; a review of this literature identified several benefits of playing. Those which have relevance for music therapy include that it can be used for mixed ability classes, it is unknown and provides a 'level playing-field' for participants, and it can develop teamwork and self-confidence.

Chapter 4 explored the use of gamelan with special needs groups. Literature reviewed included descriptive reports of work by gamelan tutors with children and adults who have physical or learning disabilities, and those with hearing impairments. Research studies conducted with adults who have learning disabilities, prisoners who self-harm, children with attention disorders and studies concerned with the physiological effects of listening to gamelan music were also reviewed. Features of gamelan playing relevant to music therapy identified from this literature include: the importance of the group-based nature of the music which is played without a conductor and generates benefits such as improving social and communication skills, and the development of team-work and listening abilities. The music was also found to help with physical coordination and to have a relaxing effect on listeners and players.

The methodological approach which most suited the study was a qualitative one. The main sources for data collection in the study were the practice of gamelan playing, both in Indonesia and the West, and the practice of gamelan tutors who work with people who have special needs and special populations. Therefore a naturalistic paradigm was indicated, which used qualitative methods to gather data from natural settings (Lincoln and Guba, 1985). The methodological approach and procedures chosen for data collection and analysis are detailed in chapter 5. In order to investigate current practice of using gamelan with special needs groups and to identify therapeutic benefits and relevance to music therapy practice, the method of conducting semi-structured interviews with a purposive sample of gamelan tutors was chosen. The data analysis method of Thematic Analysis (Braun and Clarke, 2006) was used to analyse transcriptions of these interviews. This is an inductive approach which generates a rich and detailed account of the data through the repeated coding of data and distillation of this into themes. The chapter also describes ethical procedures and situates the study within the field of music therapy research. As both a gamelan player and music therapist it was important for me to maintain a reflexive stance throughout the study, and to consider whether my own opinions and experiences were unduly affecting decisions made in the research process and data analysis. This was also important when conducting the semi-structured interviews; to allow the discussion to be led by the interviewees and according to question areas on the interview schedule. I acknowledged to the interviewees that they may have thoughts about my views regarding music therapy and gamelan playing, and demonstrated through my interviewing stance that I was fully open to their views and experiences.

Chapters 6 and 7 describe how I found gamelan tutors who work with special needs groups, selected tutors to interview, and details the procedures and methods used in the semi-structured interviews and their analysis. To locate gamelan tutors I first conducted a mapping exercise to search for all gamelan sets and gamelan activity in the UK. This is detailed in chapter 6. About 50 contact addresses were initially found for gamelan sets; these were emailed with a short series of questions about gamelan work with participants who had special needs to answer. From the replies received twenty-five gamelan tutors were identified who had undertaken work of this nature. Fifteen of these participants felt their work was significant or recent enough to answer the series of questions. The replies received gave a broad picture of the work currently being undertaken in this area. Tutors were working with a wide range of participants in a variety of settings including concert and orchestral centres, schools, arts centres, psychiatric hospitals and prisons. Most of their work was undertaken in one-off workshops with just a few tutors conducting week-long residencies. Participants for these workshops included adults and children with learning disabilities, physical disabilities and autism, adult and youth offenders, children with hearing or visual impairments, adults with mental health difficulties, and young adults with acquired brain injuries. The most commonly used type of gamelan was Central Javanese, with smaller numbers using Balinese or West Javanese. This exercise provided sufficient information to select a purposive sample of tutors to take part in the semi-structured interviews.

Nine gamelan tutors were selected to be interviewed, who between them represented all the types of gamelan, participant groups and working practices identified in the mapping exercise. The semi-structured interview procedures and analysis are described in chapter 7. Tutors were invited to talk about a range of topics including their background and training, practical aspects of the work, aims and outcomes and their thoughts on the appeal of gamelan, its particular qualities and any therapeutic elements to gamelan playing. The interviews were transcribed and subjected to a thematic analysis, as described earlier. Six Key themes were identified, relevant to the research question of what the therapeutic benefits of gamelan playing for people with special needs are. These were: accessibility; encourages engagement; offers many group work possibilities; therapeutic effects; sensory range; and cultural heritage. These themes were then described in detail, along with their sub-themes to address the research question, 'What are the therapeutic benefits of gamelan playing for people with special needs?'

In addition, two further sets of themes were identified; Procedural themes and Tutor themes. The Procedural themes related to practical and factual information such as the type and frequency of gamelan sessions, the participants and settings, thoughts on the differences between different types of gamelan sets and their specific qualities, and information about the how the music was taught and used. These themes were relevant to the consideration of how music therapists could use gamelan in practice. The Tutor themes described the experience, training and approaches of the tutors, and the aims they had for this work. This provided context for their overall replies and also informed the consideration of the experience required for a music therapist to use gamelan, defined in the later stages of the study.

Following this I considered the themes in relation to music therapy theory and practice and drew out the aspects which had most relevance to the main research question of 'What does the playing of gamelan music have to offer the practice of music therapy?' In addition, this stage began to address the research question of 'How can music therapists use these benefits in clinical work?

In order to explore this question in more depth and evaluate the relevance of the themes, I then set up and ran a short-term music therapy project using gamelan with children who have learning difficulties in a special school. This is described in Chapter 8. The project was informed by the three sets of themes; I used a small selection of Balinese instruments to work with a pre-existing group of children, a form-group, and employed musical structures of traditional gamelan music and music therapy techniques. Several of the aims of this work related to those identified as outcomes of gamelan playing; to help the pupils work together better as a group, to improve their attention and concentration, to develop their communication skills and to have an enjoyable music experience from which they could gain a sense of achievement. An evaluation of the work conducted through a case study and interviews with the teaching assistants involved, demonstrated that the therapeutic group aims were largely achieved and several of the individual pupil aims were either fully or partially met. The three sets of themes were then reviewed again in relation to the music therapy project and the elements which were most relevant and useful for music therapy practice discussed. The project demonstrated that gamelan playing could be used as a music therapy activity for this group of participants.

In chapter 9, the data, themes and ideas from all sections of the study are brought together and reviewed to produce a list of the features and qualities of gamelan playing which are relevant to music therapy and which answer the question, 'What does the playing of gamelan music have to offer the practice of music therapy?' This list is summarised here.

Gamelan playing offers a musical environment and experience which:

- a) clients will want to participate in the instruments are visually appealing and exciting, the sounds are unusual and interesting, the pentatonic tuning gives instant success and all can approach at same level of experience.
- b) clients will be able to participate in it is clear how to produce a sound, the instruments are physically easy to play, no experience is required, and they can be adapted for people with different disabilities. A range of sounds and playing actions are available and the music can accommodate participants of all abilities, making it very accessible and inclusive.
- c) has a cultural heritage which is useful for participants and therapy gamelan music reflects cultural values of working together, the importance of community and respect for others. This, together with the rituals of how one should behave around a gamelan, and the Rasa or moods of traditional pieces can all be used as part of the music therapy process.
- d) is naturally a group-playing activity as an inherently group-based music and set of instruments, group interaction is a key component of playing. This offers possibilities for many group music therapy approaches.
- e) is multi-sensory the visual appeal, tactile qualities and sound qualities can engage clients with sensory and other impairments and enable them to participate in and experience the gamelan in different ways. The varied resonances and beating sound-waves are particularly effective for participants with hearing impairments.
- f) offers a range of musical pieces and styles of different levels of complexity traditional music can range from very simple pieces to complex compositions in a variety of styles which can convey different moods and emotional

qualities. This is also reflected in the music and sounds of different gamelan sets.

- g) offers music which can be adapted and simplified the way that the music is structured enables elements to be taken from it to use for simplified versions of pieces or to use as a basis for group playing, which still retain the sense of gamelan music. Individual parts can be simplified to accommodate different ability levels.
- h) is a resource for improvisation and composition the instruments can be used as a sound source for free improvisation and for structured improvisations or composition. These can use gamelan musical structures or be otherwise structured.
- has unique sounds and timbres the particular qualities of the sounds, the range of timbres of all the different instruments and the tuning can have a positive and relaxing effect on participants.
- j) can develop a wide range of communication skills amongst participants the group nature of the music, interrelatedness of parts and the lack of a conductor require many communication skills such as listening and attending to others, and timing of responses. These can improve through playing.
- k) can improve self-confidence, self-esteem and give clients a sense of satisfaction – the accessibility and adaptability of the instruments and music enable participants to have successful experiences of playing and to develop their skills.
- can improve mood and general well-being playing together as a group can be enjoyable, release tensions and be cathartic. The quality and repetitive nature of the music can be transporting and relaxing.
- m) can develop a sense of community amongst participants the way traditional music works and the egalitarian and inclusive aspects of playing

can lead to a strong sense of community in new and existing groups of participants.

These findings demonstrate that there are many features of gamelan playing which make it an effective form of music for use in music therapy. A music therapist can take these features and use them intentionally for the purpose of addressing therapeutic aims within their clinical work. To further explain this, I have used the data analysis and my music therapy experience and expertise to propose a set of guiding principles for the use of gamelan in music therapy. These are detailed in chapter 9 and refer to the music therapy setting, the instruments and music which can be used, the client groups with whom it could be used, therapeutic aims which can be addressed, the experience required of the music therapist, and how the culture is conveyed. It is also important for the music therapist to be aware that not all participants will respond positively to the sounds and culture of the gamelan and that this needs to be taken into account when setting up and undertaking the work. A further finding was that the music therapist who uses gamelan in music therapy should have sufficient knowledge, understanding and experience of playing the music to be able to use and adapt it flexibly and to be able to convey the relevant aspects of the culture.

The chapter concludes with thoughts on where gamelan music therapy can be situated within music therapy theory and practice, in group therapy approaches, and ideas for applications in different clinical settings.

10.2 Addressing the gaps in knowledge and the envisaged outcomes

At the beginning of this study I identified that there was only a small amount of literature and research which looked at therapeutic benefits of gamelan playing for people who have special needs and with special populations. What information there was had not been collected together or considered as a whole. This study addresses this gap in knowledge by systematically investigating what these benefits are through a wide-ranging literature review and through the analysis of semi-structured interviews undertaken with gamelan tutors working in this area. A set of six Key themes and sub-themes have been produced which give detailed information about the therapeutic qualities of gamelan, and the therapeutic effects and benefits of playing.

A second gap in knowledge identified was that the benefits of gamelan playing have not been researched by a music therapist and related to music therapy practice. This has been addressed through this study which was undertaken by a music therapist. The findings were related to music therapy practice and explored through a piece of clinical music therapy work, leading to the defining of the specific features of gamelan playing which are relevant to music therapy practice. This addresses the envisioned outcome from the beginning of the study that it will 'extend the practice of music therapy and the range of musical resources available to therapists'.

A further gap in the literature which this study addresses is the use of non-western musical traditions and instruments in western music therapy. This study has researched one non-western musical tradition and found therapeutic relevance and applications for this. It follows that other non-western musical traditions could have possibilities for therapeutic use. Further research into this is therefore indicated to develop music therapy theory and practice in this area. A recommendation of the study is that music therapists could benefit from learning about the music of other cultures such as gamelan. This addresses the envisaged outcome of the study to 'create new knowledge about how western music therapists can work with people from other cultures and musical heritages'. This does not imply that therapists will only be able to work with Indonesian clients in this instance, but that by learning how to use the music of another culture they will extend their range of musical responses and become more open to listening to and incorporating other musical traditions in their playing. This also applies to music therapy training, where the exploration and learning of music from a range of cultures by students will develop and extend their musical and improvisational skills. This addresses the envisaged outcome of the study to 'have relevance for the training of music therapists'.

An identified gap in the gamelan education literature concerns how tutors can use gamelan for workshops with children and adults who have special needs. The analysis of literature and semi-structured interviews generated much data which addresses this gap which will help advance the understanding of its use in this area. Whilst it is beyond the scope of this study to extract this information and develop a separate set of guidelines and methods for the use of gamelan by tutors with these participants, it is planned to do this in the future. This addresses the envisioned outcome of the study to 'further the understanding of special needs work undertaken by gamelan tutors'.

10.3 Contribution to music therapy theory

This study has identified a new music therapy practice, that of using gamelan music and instruments for music therapy. A specific finding is that the playing of traditional gamelan music can be used by a music therapist for therapeutic aims; this is a new music therapy method. Secondly, the study has identified a range of ways for the music and instruments to be adapted and used within a range of group and individual music therapy approaches, as described in chapter 9. A further contribution is the development of a set of guiding principles for the use of gamelan in music therapy. The research is unique in that it has defined a new music therapy practice which uses a unique set of instruments and musical repertoire.

I am interested in using this theory in my own music therapy practice. I can envisage using the gamelan in new areas of practice, particularly in community settings, in addition to incorporating gamelan music structures in my usual practice with children using western instruments. This could inform both improvisation and structured music-making activities.

10.4 Limitations of the study and further indications for research.

I have made the case for a qualitative method for this study and have followed a well-documented and validated methodology (Braun and Clarke, 2006). Within the criteria of the research design I have endeavoured to be as rigorous and robust as possible. The limitations of the study are practical. As only one person undertaking the research and at the level of a PhD study, decisions and practical choices needed to be made based on the time and resources that were available. With more time and resources, I could have also gathered data from the direct observation of tutors working with special needs groups, and from analysing video recordings of their work. This is an area for further research; the analysis of special needs gamelan workshops by a music therapist who is actively looking for therapeutic aspects may reveal features of which tutors are not aware. A video analysis could be used to identify significant moments which appeared to have therapeutic potential, and to tease out what exactly in the music, playing and interactions contributed to this therapeutic potential.

In the development of the list of relevant features of gamelan playing to music therapy, the Interview themes were explored in one clinical setting (children with learning disabilities). Whilst this was valid within the parameters of the research, (informing the development of the final list), if more time and resources had been available, the themes could have been explored in a range of settings.

The findings of the study can be generalised to a broad context. The research is based on literature and interviews which refer to work with a range of participant groups and settings; therefore the list of gamelan features relevant to music therapy are applicable to this wide range of potential clients, settings and therapeutic purposes. To take the research further, some more specific areas could next be researched.

Using the 'Principles for the use of gamelan in music therapy' and the list of relevant features identified in this study, music therapy projects could be undertaken with different clients groups, and the outcomes analysed to investigate, for example, whether any features have particular relevance with different participants and whether any new features can be found.

The music therapy project used one type of gamelan, a Balinese Angklung. If more projects had been undertaken, it would have been informative to use different sets of instruments to gain further knowledge of the different effects of these. An additional area for research therefore would be to explore in more detail the qualities of different Javanese and Balinese gamelan sets and music, to investigate whether there are any specific qualities or features of each which can be chosen to use for particular therapeutic purposes or client groups.

10.4 Conclusion

This study has considered the relevance of gamelan music to music therapy practice. It has answered the main research question, 'What does the playing of gamelan music have to offer the practice of music therapy?' by identifying the therapeutic benefits of gamelan playing, exploring these in a clinical setting and producing a detailed list of the features of gamelan playing which make it relevant to music therapy practice. The study does not suggest that gamelan playing is suitable for all forms of music therapy, but that it can be used where the therapeutic benefits of gamelan playing sufficiently match the therapeutic aims or needs of the music therapy situation and clients. This could be situated within a range of music therapy models and approaches. New knowledge and music therapy theory has been created. More research will develop this theory and practice further.

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Appendices

Appendix A: Gamelan instruments, dance and puppet theatre

All photos taken by author unless otherwise stated

Javanese gamelan



Picture by Alx Leeks, courtesy of Southbank Centre



Javanese Rebab



Balinese Angklung gong



Kenong pots (forming a pen)

Javanese slenthem



Balinese dancers with gamelan



Javanese Wayang (puppet) theatre: Southbank Gamelan Payers



Appendix B: Ethics Application Form

Anglia Ruskin University: Ethics Application Form PLEASE COMPLETE THE FORM IN WORD PROCESSING FORMAT. HANDWRITTEN APPLICATIONS WILL NOT BE ACCEPTED.

Name	Helen Loth
Faculty	ALSS
Title of Proposed	An investigation into the relevance of gamelan music to the practice
Research	of music therapy
Address	Music Therapy Clinic, Anglia Ruskin University, Cambridge
	Home:
E-mail address	helen.loth@anglia.ac.uk
Type of	Undergraduate student
Researcher	Postgraduate student:
(please tick)	Masters x Doctorate Other please state
	x Member of staff
Supervisor/Project	Dr Amelia Oldfield
Director	
Collaborators	
Expected date of	September 2008
commencement	
Approximate	5 years
duration	
Externally funded	Yes
	x No

The University offers indemnity insurance to researchers who have obtained formal written ethics approval for their research. For details see page 25 of "*Ethics Committee Procedures for the Conduct of Research*".

1. Briefly describe the rationale for and state the value of the research you wish to undertake.

Over the last twenty years there has been a large increase in the number of sets of gamelan instruments in the UK. These are being used in universities, schools and community centres. More recently, these instruments are also being used in music groups with children and adults with a range of special needs and situations, such as those with learning disabilities or mental health problems, (South Bank Gamelan, Strathclyde and Glasgow Gamelan) the hearing impaired (The Seashell Gamelan, Royal Schools for the Deaf, Manchester), young offenders and prisoners (Firebird Trust, Good Vibrations Project).

There has been very little research into the effectiveness of this use of the gamelan. The aims of this work are usually described as broadly educational or musical (Sanger and Kippen (1987). None of the workshop leaders are music therapists and they do not claim to be doing music therapy, however, many are also making additional claims of the therapeutic benefits of this work. These can be general, such as improving communication skills (MacDonald et al 1999) or more specific, for example reducing self-harming behaviour in female prisoners (Digard, Grafin von Sponeck and Liebling, 2007). The overall range of perceived benefits have not been systematically explored or verified, and they have not been studied by a music therapist. This study aims to address this gap in knowledge.

This study will:

2.

- extend the practice of music therapy and the range of musical resources and responses available to therapists
- create new knowledge about how western music therapists can work with people from other cultures and musical heritages, and address their musical assumptions
- have significance for the training of music therapists.
- develop a greater understanding between community musicians and music therapists

Suitability/qualifications of researchers to undertake the research.

As an experienced music therapist and gamelan musician I believe I am uniquely placed to investigate the connections between the two practices. Over the last 15 years I have published several book chapters and journal articles investigating my own clinical practice. I have undertaken two small research projects; the first investigated the selection procedures for MA Music Therapy applicants at Anglia Ruskin University, using semi-structured interviews and self-devised rating scales and the second used questionnaires to look at further training amongst the music therapy profession in Britain. I have participated in many research training events in the music therapy profession and believe I have been developing the skills necessary to undertake this study.

3. What are the aims of the research?

The aims of this research are firstly to discover what the therapeutic benefits of playing gamelan are for people who have differing special needs through the study of current and past practice, and secondly to investigate how to apply these benefits to group music therapy with children who have either learning or emotional difficulties.

4. Briefly describe the overall design of the project

This will be a qualitative research study (Miles and Huberman, 1984) using several paradigm of naturalistic enquiry (Lincoln and Guber 1985)) and a phenomenological approach (Forinash 1995) to the analysis of the data. It will have an emergent design as the study will develop from the information and ideas collected.

Outline plan

Year one

- 1. Introduction to the whole study
- 2. Brief history of development of Gamelan in and outside Indonesia and the development of gamelan use with special needs populations
- 3. Literature review

Year two

- 4. Mapping of gamelan use with special needs populations in the UK
- 5. Semi-structured interviews with a purposive sample of up to 10 representative gamelan tutors working with different client populations. These will explore in depth the tutors' perceptions of the benefits of gamelan playing in their practice.

Year three

- 6. Transcription on Interviews and thematic analysis
- 7. Overarching data analysis
- 8. Synthesis of all data to develop a set of guidelines for use of key features of gamelan in clinical music therapy

Year four

- 9. Run series of music therapy sessions using these features. These sessions will be videoed and analysed
- 10. Outcomes. Applications of findings for music therapists
- 11. Conclusion and suggestions for future research

Year five

12. Writing up

5. Briefly describe the methods of data collection and analysis

A mapping exercise will be conducted, through email, asking all gamelan tutors in the UK what special needs groups they work with. The results will be collated and all personal details of the respondents removed from the data.

Up to ten semi-structured interviews will be conducted with gamelan tutors. These interviews will be recorded and transcribed. They will be analysed using a phenomenological approach, identifying themes and common methods. Recordings will be securely stored without personal identifying features. These will be kept separately to the written transcriptions.

The music therapy group sessions will be videoed and written up by the researcher. A case-study analysis will be undertaken of the project. In addition, relevant teachers, support staff and other school staff will be interviewed briefly at the end of the project. They will be asked for their opinions on the effect of the project on individual pupils, and the general impact of it on the school. These views will be added to the case study data to form the evaluation of the pilot project.

6. Describe the participants: give the age range, gender and any particular characteristics pertinent to the research project. *For experimental studies state the inclusion and exclusion criteria*

The Gamelan tutors who will be interviewed will be selected following the mapping exercise. They will be diverse in age and gender.

It is not yet known who the participants will be in the workshops which are videoed, as this depends on the outcomes of the previous stages (above). They will include children and adults have some kind of special needs or be in special circumstances, such as adults with mental health or learning difficulties, or hearing impaired children.

Participants for the second part of the study, (to be known as the 'Gamelan therapy project' will be children who attend a school for children with Special Educational Needs. They will be between the ages of 11 and 15, male and female and will have a range of Learning Difficulties.

Inclusion criteria are that they have special needs which require them to attend the school, usually moderate to severe learning disabilities. They should be expected to be able to attend the majority of the 8 sessions.

Exclusion criteria are children aged 16 and over, those with severe health problems which might lead to extended periods of absence from the school during the period of the project.

The School taking part in the project is likely to be XXXXX School. Once this has been finalised, written permission from the Head Teacher to undertake the Gamelan Therapy Project in the school will be obtained and the letter forwarded to the RESC.

7. If your participants are under 18, please attach a copy of your clearance letter from the Criminal Records Bureau (if UK) or equivalent non-UK clearance, or, if not, explain below:

Recent clearances attached. The exact clearance will be dependent of the settings (who may need their own check)

Cambridgeshire Council clearance attached, schools may require a further CRB which will be undertaken if necessary, as will an Anglia Ruskin CRB check.

8. How will the participants be selected and recruited?

Participants for semi-structured interviews will be invited from the respondents to the mapping exercise. The selection will be a purposive sample, based upon achieving a range of different types of workshop and teaching experience with different populations. They will be invited to participate in the study and given full information about it.

For the 'Gamelan therapy project' a selection process will be undertaken by the principal researcher in consultation with the teaching and music therapy staff of the school. Staff will be asked to identify a group of children who may benefit from additional help with the development of communication, social and emotional skills. The development of these skills is part of the core curriculum for special schools and have been identified in the earlier part of the research as areas which playing gamelan can have a positive effect. This may be a naturally occurring group of children, such as a class, who will all be offered the opportunity to take part together. Alternatively, teachers and therapists will be asked to select individual children to join the group.

9. How many participants will be involved? For experimental studies, specify how the sample size was determined. In clinical trials, a Power calculation *must* be included.

Up to ten interviews will be conducted, each with one or two tutors. Participants for videoing will be selected following the semi-structured interviews, choosing the three areas which give the most contrast and who are willing to be videoed

For the 'Gamelan therapy project' a group of between 8 and 15 children will be involved. Results from the earlier stages of the research indicate that when conducting group sessions, groups of between 8 and 15 are the most effective. Class sizes in special schools tend to be small so working with a class may be appropriate. This is a pilot project of gamelan workshops, applying the guidelines to just one set of participants and client groups. Further research would involve different numbers of participants. A small number of school staff will be interviewed for this stage.

10. What procedures will be carried out on the participants (if applicable)? Gamelan tutors will be interviewed and the interviews recorded.

For the final part of the study, a pilot study of using gamelan in music therapy will be undertaken. One group of children will take part in a series of 8, weekly gamelan sessions, lasting between 30-45 minutes each. These will involve playing music together on Indonesian gamelan instruments with a therapeutic approach. The sessions will be led by the researcher and assisted by school support staff as required by the school. A range of musical activities will be used, as determined by the set of guidelines from the earlier part of the research. These will be matched to the therapeutic aims of the sessions, which will be determined according to the final selection of group members. Broadly, the aims will be to improve communication, social and emotional skills. It is envisaged that this may also be an enjoyable group music experience. Every effort will be taken to minimise the intrusion to normal school activities. The primary researcher will be guided by school staff with regards to the timing of the sessions, and which, if any lessons may be missed. (For example, the gamelan therapy project may take place in the weekly music lesson slot.)

School staff will be interviewed by the researcher after the 8-week block of gamelan therapy for their views on the effect of the project.

11. What potential risks to the participants do you foresee?

1. Through being interviewed, gamelan tutors may begin to look at their practice in different ways.

2.Gamelan group participants may be affected by being recorded and therefore behave differently to usual

Participants in the 'gamelan therapy project' may find the sounds or vibrations of the instruments too disturbing

12. How do you propose to ameliorate/deal with potential risks to participants?

1. The researcher would strive to ensure that the interview procedure was open and non-judgemental.

2. The videoing of groups would be kept as un-intrusive as possible. Participants would reassured that videoing could be stopped any time without affecting the workshop or class. It would also be stopped if the researcher or gamelan tutor felt it was affecting the usual state of the group or participants.

Any difficulties with the sounds of the gamelan would be worked with in the context of the therapy sessions (for example by the group playing softer or adapting to each other's needs. However if a participant remained upset by the sounds they would be able to leave the sessions without any repercussions.

13. What potential risks to the interests of the researchers do you foresee? Gamelan tutors being interviewed may wish to draw the researcher into discussion on music therapy approaches to their work and wish to make comparisons.

Challenging behaviour by children participating in the gamelan sessions may affect the researcher's ability to proceed with the sessions

14. How will you ameliorate/deal with potential risks to the interests of researchers?

Researcher will clearly explain the purpose of the study to the tutor, including the need not to bring information on the researcher's own practice into the interview.

The researcher will prepare fully with school staff and be informed of any risks associated with individual children. All school risk procedures would be complied with. Support staff will be included in the sessions as deemed necessary by the school.

15. Has a risk assessment been completed? (Yes/No) (Please be aware that the risk assessment must be kept on file and updated annually). Details of the risk assessment procedure can be found at http://rmd.anglia.ac.uk/form.asp?id=17§ionid=19 No 16. How will you brief and debrief participants? (Attach copy of information to be given to participants)

All participants will be given a participation information sheet for their part of the study. This will be discussed with them, and, in the case of children or vulnerable adults who are being videoed, with their carers or parents or responsible members of the organisation involved if appropriate, to ensure it is fully understood. Adequate time will be allowed for this process to be completed before the relevant part of the study commences.

Interviewees may be given transcripts of their interviews to review if wished for.

Gamelan tutors will be given summaries of the general findings of the study when it has finished.

Pupil participants in the 'Gamelan therapy project' will be talked to by the researcher and the project explained to them. They will also, where appropriate, be given an information sheet which uses simple language and pictures to describe the project. Parents of the children will be given full participation information sheets to explain the project and what the children will be required to do. Teachers will be given information sheets about the project and the researcher will be available to answer any questions. They will be informed of the outcomes of the project after its completion.

17.	Will	informed	consent	be	souaht	from	Yes (Please attach a copy of the	х
participants?			consent form)					
partio	panto	•					No	
If no please explain below:								

II no, please explain below

If there are doubts about participants' abilities to give informed consent, what steps 18. have you taken to ensure that they are willing to participate?

All legal and local consent procedures and ethics standards will be followed for participants unable to give fully informed consent. If no such procedures exist, nationally recognised procedures for the client population will be followed. In addition to following these procedures, great care will be taken to ensure that no participants are unhappy about being part of the research investigation. Participants will be able to withdraw from the study at any point without this affecting the service they receive.

The children will have the Gamelan Therapy Project explained to them by the researcher and by teaching staff. They will be given the opportunity to ask as many questions about it as they like. If it is felt appropriate by staff, they will be given an information sheet about the project, written in appropriate language. This will be read to them and discussed with them. They will be asked to show whether they would like to part in the project, giving either a verbal answer or written agreement, on a simplified consent form, if appropriate. A verbal agreement will also be recorded as such on the consent form by the researcher. If a child shows that they do not wish to take part, or leaves the sessions, this will be respected.

19. If participants are under 18 years of age please describe how you will seek informed consent

Parental consent will be sought for all children in the gamelan project. Parents will be provided with an information sheet which explains the project and the activities their child will be involved in. They will be given a consent form to sign and return to the school. The school will be asked to send this information to parents, and to receive replies; the researcher will not contact the parents directly. The information sheet will provide full contact details of the researcher invite parents to contact her if they have any questions or concerns about the project, at any stage. If it is felt appropriate by the teaching staff, children will be given a simplified consent form to sign, as detailed in section 18.

20. How will consent be recorded?

Consent will be recorded on paper consent forms. Copies will be given to all participants. Copies of consent forms will be kept securely and separate from the raw data and videos.

21.	Will participants be informed of the right to withdraw without penalty?	Yes	Х
		No	
If no, please detail the reasons for this:			

22. How do you propose to ensure participants' confidentiality and anonymity?

Gamelan tutors details will be made anonymous in the recording of information. Tapes will be securely stored without personal identifying features. These will be kept separately to the written transcriptions.

Names and locations will be removed from transcripts. It is recognised that some tutors may work in unique settings and be the only one, so their identity may be recognisable to others in the profession. If this is the case all steps will be taken to disguise the setting and tutor.

Video tapes will be stored securely with all written identifying features removed. The identities of the group participants (other than the gamelan tutor) will not be known and therefore not used. The group identity or location will not be kept with the tape.

Children involved in the 'Gamelan Therapy Project' will not be referred to by name in the study. If referred to in writing a pseudonym will be used. The school name will not be used, nor location so that it will not be recognisable. All recordings of the gamelan sessions will be labelled by code, and kept in secure storage. It is recognised that if using video, children will be recognisable. All efforts will be made to keep this as anonymous as possible and no other identifying factors will be used.

23. Please describe which of the following will be involved in your arrangements for storing data:

 $\sqrt{}$ Manual files (e.g. paper documents or X-rays)

These will be stored in a locked filing cabinet on home premises.

 $\sqrt{}$ Home or other personal computer

Data will only be stored on a memory stick. This will be kept securely at all times. The computer is password protected.

 $\sqrt{}$ University computer

Computer is password protected. University e mail will be used in communications with participants of the mapping exercise. This is also password protected.

✓ Laptop computer

Data will be stored on a memory stick, portable hard-drive and hard-drive. This will be kept securely at all times.

Please explain, for each of the above, the arrangements you will make for the security of the data (please note that any data stored on computer must have password protection as a minimum requirement):

24.	Will payments be made to participants?	Yes	
		No	Х
lf yes,	please specify:		

25. Modification of Proposal

26. **(EXTERNALLY-FUNDED PROJECTS ONLY)** Has the funding body Yes been informed of and agreed to abide by Anglia Ruskin University's Ethics No Procedures and standards?

If no, please explain below:

27. (EXTERNALLY-FUNDED PROJECTS ONLY) Has the funder		
placed any restrictions on a) the conduct of the research b) publication of results?	No	
If yes, please detail below:		

28. Are there any further points you wish to make in justification of the proposed research?

UREC REGISTER

UREC publishes a list of approved projects on the University intranet, which is searchable by all staff and students of the University. The entry for each project comprises the following data:

- project title
- funding body (if appropriate)
- duration of project
- date and expiry of ethics approval
- name of researcher

Inclusion on this list is a condition of ethics approval, unless the Committee is informed of compelling reasons for an exemption. If you wish to request that your information is withheld, please tick the box below and state the reasons for your request.

I <u>do not</u> wish my project details to be included on the UREC list for the following reasons:

Please indicate that you are enclosing with	this form the following completed documents:
X Participant consent form	X Participant Information Sheet
X Summary of the research	
Signed	Date
Statement of Supervisor's / Project Director	r's support*
I support this application:	
Signed	Date
Title	

*applications not countersigned by a supervisor/project director will not be accepted; please note that this applies equally to members of staff who are also students

Appendix C: Pilot Interview Schedule

<u>1.Tutor's background and experience</u>
How did you begin working with gamelan
What is your background, experience? Are you a professional musician, teacher?
Do you have any training to work with special needs groups?
Do you have any training in teaching gamelan, how do you decide how to do it...?
Why are you working with gamelan?
Have you had any training in working with special needs groups using gamelan?

2. The clients or populations worked with

Who exactly do you (or have you in the past) worked with and why? How do they respond? What feedback from clients have you had? From people and professionals involved with your clients? What do you think your clients get from their gamelan experiences...?

3. The nature of the work – how use the music and instruments

How do you teach gamelan? Do you teach traditional gamelan pieces Do you teach in the traditional manner (aural, rote) Do you use traditional ways or structures of playing the instruments Do you need to adapt these in any ways? What other ways do you create the musical structures Do you use the gamelan alongside other traditional arts, ie wayang or dance? Do you combine gamelan with anything else, other instruments or art forms? Do you adhere to traditional customs in your work (eg shoes off etc) Do you use improvisation? If so, how and why? How important is the 'group' in the work

4.Practical aspects of the work, set-up, group size, frequency etc

What sort of size groups do you find works or doesn't work

Do you do much 1:1 work, why yes or no?

What do you find the best frequency?

Positives and negatives of different ways of working, e.g. one-offs, week- long residencies

Do you have co-workers in the work? If so, who, what is their role

5.Aims and outcomes of the work

What are your aims in your work with each client group – what is the purpose of the workshop/class etc.

Are there any 'secondary' benefits you notice which are not your defined aims? What is 'special' about gamelan?

How is it effective?

What is it effective for?

When is it not effective?

Any negative experiences you have had with gamelan? Have you adapted the way you work over time? In what ways? Can you compare this work to any other you do a) With same clients but with different music/instruments or b) With gamelan but not with special needs groups?

6. The appeal of gamelan, unique aspects

What do you think is the appeal of the gamelan?

Do you think there is anything 'therapeutic' about working using gamelan? Would you call your work music therapy? What works well, what doesn't

Anglia Ruskin Headed note-paper

Music Therapy Clinic 0845 196 2663 helen.loth@anglia.ac.uk

PARTICIPANT INFORMATION SHEET

Section A: The Research Project

- 1. Title: An investigation into the relevance of gamelan music to the practice of music therapy
- 2. The purpose of this study is to explore the therapeutic aspects of playing gamelan. It will investigate the benefits already being experienced by participants in gamelan workshops and classes taking place with children and adults who have differing special needs. It will then look at how these benefits can be applied in music therapy sessions with children.

The study will be of value to gamelan tutors and to music therapists. By identifying many of the key aspects of what makes using gamelan so effective with these client groups, and bringing together the work of many experienced tutors, it will offer gamelan tutors new information and tools to enhance their work in this area. Music therapy practice will be extended through the use of non-western instruments, playing techniques and tonalities.

- 3. As a gamelan tutor who has experience of working with children or adults who have special needs, or with special populations, you are invited to participate in this study.
- 4. This research is organised by Helen Loth, Senior Lecturer in Music Therapy at Anglia Ruskin University
- 5. The study is being undertaken as part of a PhD study. The results will be published in this PhD. Parts of the study may also be published in journals and presented at conferences.
- 6. The research is mainly self-funded with some assistance from The Music Therapy Charity and from Anglia Ruskin University.
- 7. For further information please contact Helen Loth, Music Therapy Clinic, Anglia Ruskin University, East Road, Cambridge CB1 1PT <u>helen.loth@anglia.ac.uk</u> 0845 196 2663

Section B: Your Participation in the Research Project

- 1. You have been invited to take part as a gamelan tutor who is currently or has in the past conducted gamelan workshops or classes with children and/or adults who have special needs or with special populations.
- 2. Participation in this study is entirely voluntary.

- 3. You may withdraw from this study at any time by filling out the withdrawal of consent slip at the end of the consent form and returning it to Helen Loth at the address given.
- 4. If you agree to take part, you will be asked to take-part in a semi-structured interview with the researcher. This will involve being asked a series of open-ended questions about the work you do or have done in the past using gamelan with special needs groups or populations.
- 5. The interview will be recorded and transcribed by the researcher. This will be analysed by the researcher together with the transcriptions from other tutors, to look for general themes relating to the beneficial aspects of gamelan playing. These will form the basis for further investigation in the study.
- 6. It is envisaged that the interview will be a useful and interesting experience, offering you the opportunity to reflect on and explore the work you are doing in further detail. The results from the study will be made available to you and will offer information and tools that may be helpful in enhancing your practice.
- 7. All identifying features will be removed from the recording and transcription of your interview. These will be kept securely in locked storage, separately to your name and details. Your responses will be kept anonymous in the written study.

YOU WILL BE GIVEN A COPY OF THIS TO KEEP, TOGETHER WITH A COPY OF YOUR CONSENT FORM

PARTICIPANT CONSENT FORM

NAME OF PARTICIPANT:

Title of the project: An investigation into the relevance of gamelan music to the practice of music therapy

Main investigator and contact details: Helen Loth, Senior Lecturer, Music Therapy.

Music Therapy Clinic, Anglia Ruskin University, East Road, Cambridge CB1 1PT. <u>helen.loth@anglia.ac.uk</u> 0845 196 2663

- 1. I agree to take part in the above research. I have read the Participant Information Sheet which is attached to this form. I understand what my role will be in this research, and all my questions have been answered to my satisfaction.
- 2. I understand that I am free to withdraw from the research at any time, for any reason and without prejudice.
- 3. I have been informed that the confidentiality of the information I provide will be safeguarded.
- 4. I am free to ask any questions at any time before and during the study.
- 5. I have been provided with a copy of this form and the Participant Information Sheet.

Data Protection: I agree to the University¹ processing personal data which I have supplied. I

agree to the processing of such data for any purposes connected with the Research Project as

outlined to me*

Name of witness (print)......Date.....Date.....

YOU WILL BE GIVEN A COPY OF THIS FORM TO KEEP

If you wish to withdraw from the research, please complete the form below and return to the main investigator named above.

Title of Project: An investigation into the relevance of gamelan music to music therapy practice I WISH TO WITHDRAW FROM THIS STUDY

Signed: _____

Date: _____

¹ "The University" includes Anglia Ruskin University and its partner colleges

Gamelan tutors

Procedure for semi-structured interviews

I will invite you to talk about the following subject areas:

Question areas:

- 1. Your background and relevant experience in gamelan and other areas
- 2. The client groups or populations you are working with or have done so in the past
- 3. Practical aspects of the work, set-up, group size, frequency of sessions etc
- 4. The nature of the gamelan work how you use the music and instruments
- 5. Aims and outcomes of the work
- 6. Your thoughts on the appeal of gamelan

The interview will take approximately one hour. You may answer questions in any way you choose; it is hoped that we will have a free-flowing talk about this work. The interview will be audio-recorded and transcribed.

You will be given a Participant Information Sheet and Consent form.

Helen Loth 20.3.2010

Appendix E: Interview Transcript (sample section)

(interviewer shown in italics)

So what are the aims of that work, how is that set up?

I suppose mainly it's just to give them a chance to try out some other instruments to the instruments they've got at the college anyway. They have quite a good section, they've got a very good music teacher there and a lot of stuff but obviously gamelan's really quite different to most of the stuff they get to use normally. And I think it's mainly that and just a chance to explore different sound worlds, try out the, and with the gongs particularly those who are pretty much wheelchair bound they can hold the beater and move their wheelchair so they can hit the gong and with that little movement that's quite a lot of noise that you get compared to with normal percussion and things. It gives them a lot of kind, of, they can produce a lot more sound, a lot more satisfying physical contact

The movement of the wheelchair produces the sound?

Yes, well they hold the beater and then using their, they're in those kind of wheelchairs that have a little joy stick with one, hand, they then move themselves around a little bit and give them a 'whoooph' so that the beater goes onto the gong, they set themselves up...

Rather than their arm doing it?

Yes, they're hitting it with the beater holding it in their other hand but the motion comes from their, I mean there are some of them who can hit it themselves who aren't in wheelchairs and you know they can reach a few kenongs from the wheelchair

And what about the sarons and things, how do they play those?

We've tried various things like getting them up on, depending on what size their wheelchair is, some of them have trays and, or we put them up on a chair in front of them

And people can lift their arms some of them?

Some of them yes, it's quite a lot of variety.

Disabled upper-body disability as well?

Yeh

I suppose I was wondering what sort of adaptations you do for them

Shifting stuff around, putting stuff on chairs, things like that. I suppose just moving things as much as possible. We haven't got any specifically designed special benches to rise them or anything like that.

Or special beaters or things to attach to arms or

I do quite a lot of flexible beaters but we don't have any specific beaters with straps or anything, it's one thing that we should maybe think about doing is getting some beaters that, they seem to generally, I'm quite flexible with what beaters we use with what instrument, cos the gong beater is usually far too heavy so I use a kempul beater or a gender beater on it

And these, just to be clear, these are people with physical disabilities, acquired brain injuries, do they have any learning disabilities or psychological problems?

I don't think so, not normally. I think some of them have such severe brain injury that it could be hard to tell do you know what I mean, but some of them are very much totally cognitively fine, it's just that they can't do anything physically about it. There is a fair amount of variety I think.

Goodness, yes you said that. So you said you're doing these sort of creative projects, how do you teach gamelan with them, do you do traditional methods or do you adapt, what do you do?

It depends on who's there, thinking of the last extended project I did with them, I had I think there were 5 people in that group, 3 of whom were wheelchair users and 2 who weren't, so what I did was I set up, kind of using traditional ideas but it was no way recognisably a traditional piece

You didn't teach a piece?

I didn't teach a piece as such, I just got them to set up, I got a gong riff going between a suwukan and a gong, and I had someone playing a kenong on one of them, and then I had one of the people who was a lot more mobile playing stuff on the bonang. He was particularly creative, I didn't have to say 'play this', cos I said, 'do something on there' and he just came up with something that fitted in very nicely so I let him get on with it. And so I suppose mainly I do a mix of giving people stuff to do and then, if they run with it, that's also great!

And the aim is to create a piece or?

The aim is to, for that particular thing it was to come up with a number of pieces for different sections of their shadow puppet play. So we had, we were doing something that was a calm peaceful piece, then we had something that was supposed to be more intense and more rhythmically pulsing, and, there were three I can't remember what the third one was. So we set up kind of three levels of intensity that they could use for different things.

And so they had sort of titles, you were working to a theme?

A theme mainly, the idea was to have like an ayak-ayakan, a srepegan and a sampak type thing that they could, do you know what I mean, so something that was expansive and slow, something that was a little more intense, and something that was quite punchy, and they could then slot in as appropriate.

Appendix F: Coded transcript (sample section)

I didn't teach a piece as such, I just got them to set up, I got a gong riff going between a suwukan and a gong, and I had someone playing a kenong on one of them, and then I had one of the people who was a lot more mobile playing stuff on the bonang. He was particularly creative, I didn't have to say 'play this', cos I said, 'do something on there' and he just came up with something that fitted in very nicely so I let him get on with it. And so I suppose mainly I do a mix of giving people stuff to do and then, if they run with it, that's also great! C243	Use traditional structures and ideas to create own piece
A theme mainly, the idea was to have like an ayak- ayakan, a srepegan and a sampak type thing that they could, do you know what I mean, so something that was expansive and slow, something that was a little more intense, and something that was quite punchy, and they could then slot in as appropriate. C262	Use traditional structures, compose to themes, as accompaniment
normally 5 or 6, which because there's the variety of ability physically in the group, you don't generally have enough people that, it would be rare that I would have people who could play saron and someone who could play bonang and someone who could easily play gong.	Group size dictated by disability
I suppose I generally work on the principle that, you're on wheels, you don't need to take your shoes off! C295	Don't enforce etiquette
I don't get fussy about it if there's someone who's severely autistic and there's a problem taking their shoes off. I'm not going to say 'no you've got to take your shoes off otherwise you're not playing' you can't do that. C299	Don't enforce etiquette, adapt as approriate
They're generally just amazed by the quality of the sounds, the depth of the vibration and the resonance of it C313	Reactions to sounds of amazement
Probably moderate learning difficulties most of them yeh. And I tend to, I tend to, my basic principle, unless everyone's in wheelchairs, I tend to run on the principle that I'm going to run the workshop as normal, basically C416	Tutor's aims same as for non- learning disabled
Cos the way I do my workshops is to build them up bit by bit by bit by bit, and depending on what speed people are going at. So if people are going slower I just do less, and say have a piece that is 2 notes, or a piece that's 4 notes or a piece that's 6 notes or a piece that's 8 notes and or, you know more bits around it. So I start building it up the same as I would a normal workshop and see where they're at, basically, and then go from there C426	Use traditional structures, building up as in normal work for many SN groups
serious learning disabilities or more physically challenged I do sometimes do, like I've got a different kind of set of stuff that I do. Like hitting my drum and they start playing, and then I hit the drum again and they stop so I act as the switch for a bit. Then I have one half playing and then the other half playing in turns, and then say you play, I'll hit, you play, I'll hit and just building up rhythmic games like that C432	Works differently if participants very disabled
Well, I'll use like 2 or 4 notes out of a lancaran, so I might use 2126 which you could say is a bit of Candra Bubra but could just be 2126, do you know what I mean it's just C444	Bases work on traditional structures
I've generally got a piece on my head that I'm going from C475	Tutor holds musical ideas inside

So it's always very flexible in my mind, no matter what	Has same aims regardless of	
group I'm working with, so I tend to aim for the same	whether led or not	
outcomes regardless and just see how Cos I think you still get the kind of gamelan workshop outcomes, even		
if you're playing two notes and everyone around you's	Group feeling aim	
doing things. That sort of sense of playing in a group		
and being surrounded by it all C481		
Or pick a note, play your note now, play your note now,	Uses very simplified structure	
let's have your note then your note then your note, then	Uses very simplified structure	
maybe let's have 2 notes and let's play our 2 notes.		
C496		
in traditional gamelan, that's where I'm coming from.	Flexibility of gamelan music	
Because it's infinitely flexible really C504	, 5	
looked-after children C520	Looked-after children, ,	
funny sort of group dynamic with them C529	different dynamic	
to give them a totally different musical experience, and	Aim to give a very new musical	
something that, it helped them do something as a	experience (Looked-after)	
group C565	<u>I</u>	
to give them a totally different musical experience, and	Aim to give a group experience	
something that, it helped them do something as a		
group C565		
And to give them this opportunity to perform together	Aim to perform as a group	
as a group cos they then played at the beginning of our,		
we had this sort of fiesta in the park as part of the		
music festivals, and the community group always plays		
for that. And they played as part of that C566		
Because when we performed it they just sat down perfectly, they knew they had an audience, and they	Difficult children able to	
played absolutely brilliantly, absolutely brilliantly C582	perform – very positive	
	experience for them	
And they really did work as a team, they really helped	Group experience helped them	
each other out, you know they were saying [whispers]	work as team, help each other	
'it's that bit, we're doing this piece now'! pointing to the		
words if someone got lost and things C583		
then they sang with the community group	Combined SN children with	
accompanying them, which they really liked! Well both		
groups found that really good! C571	community group in	
groups found that fearly good. Covi	performance – important for children	
	children	
I suppose the reason <u>I'm</u> doing so much gamelan is	Importance of group-feeling for	
because I got it more strongly in gamelan C592		
because I got it more strongly in gamelan C592 The sense of community and the sense of group. C597	Importance of group-feeling for tutor as reason for playing-	
because I got it more strongly in gamelan C592 The sense of community and the sense of group. C597 My personal theory, which could be wrong, is the way	Importance of group-feeling for tutor as reason for playing- Importance of 'pre-supposed	
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issues, they just get on and do it, and they're quite happy enjoying things and showing they enjoy something. They're not hung up on being cool in any way C625				
I suppose the way you have to know where everyone else is because you're playing things when someone else gets to a particular point. It's not just go 1 2 3 hit, 1 2 3 hit. I mean you can do it that way but you're listening till you get to that note and then you're playing with that note. So it's making people aware of other people, and knowing that they've got to do it C634	Importance of group-awareness in order to play Importance of listening			
they suddenly realise 'oh that's what it sounds like when we're all playing the right thing' and they go 'ooh!' C640	Get musical feedback when playing it right			
Because suddenly everyone becomes aware, I mean that happens universally with gamelan workshops, regardless of who's doing it they suddenly go 'oh ok I know what we're listening for now, I know what we're' And then people realise what you can produce as an ensemble. It just gives you access to that ensemble activity without too much stress. C646	Participants develop awareness of their place in the music, gives positive ensemble experience Un-stressful way to play as			
I think that's not actually generally that thought through, to be brutally honest about it. I think it's generally just, 'oh it would be nice for them to do that, why don't' C656	ensemble Reasons for using G with SP generally not thought about properly			
You know that really does come through in the fact that none of us has been trained to teach gamelan for special needs, we just do it C658	Lack of training for tutors reflects idea that SN not important			
And there is always that thing, people think, oh gamelan's easy to play. C664	Disparaging ideas towards using G with SN			
You can hit things quite easily, and you can play gamelan <i>fairly</i> easily, but, I suppose what it majors on is that whole listening thing, and playing with everyone else is more what it's about. C673	Gamelan easy to play physically but listening more important			
Or a group that turns up who are 'oh you'll really like teaching them, they're all grade 8 cello' and they're awful, cos they won't listen to each other! C677	and they're as well with G			
there's a kid who's the one who the teacher doesn't think is that able, or is a little bit troublesome. But you kind of think, no I'm going to take the risk, I'm going to	Can help transform a difficult child			
put him on gong. And he suddenly becomes the most responsible person in the room and is going 'I'm doing this! I'm doing it right, and I'm holding everything	Can boost self-esteem			
together' And just see them light up, with the realisation that they needn't be the one who's hopeless and getting lost, and they're actually doing something that's really important to the overall make-up of the piece. C684	Simple parts are very important to the whole music			
Yes and because it's a totally level playing field. None of them have ever done it before C696	Equality of players, none have done it before makes it more accessible			
And I think that's also possibly going back to this one of the major keys with gamelan that for every <i>level</i> of ability and every <i>kind</i> of musical ability there's	Gamelan caters for all levels of ability			
something that someone can do. So someone who's just good at listening to the tune, knowing where they are and just hitting the gong, every eighth beat or when they get to that point in the tune. And that's equally as	Can put people on parts according to their ability			
satisfying as playing the bonang penerus part and going, 'ding ding ding, ding ding ding' because it is equally as meaningful, despite the fact that they're not	All parts/instruments are equally important to the whole and therefore satisfying			

Tutor assess participant's musicality first through warm- up activities	
Range of abilities catered for nakes G more useful/appealing for SN work as can still create piece music with these abilities	
Session length and frequency lependent on external factors, eg funding, organisations	
Predominantly does one-off vorkshops	
Co-workers generally not used or needed	
Physical appeal of G as nasculine – good for EBD boys excluded)	
mportance of the physicality of he instruments in appeal	
Gives a feeling of containment, when playing	
Gives sense of security which benefits autistic children	
Autistic children response positive	
Feeling of safety from solidity on instruments	
Autistic children able to	

whole thing, and how much they don't need to get away	
from it	
C895	

Appendix G: Full list of candidate themes and sub-themes

Where and who work with

Adults: mental health

Learning disabilities/additional needs Multiple disabilities – hearing/visual impairment/physical disability Recovering alcoholics/drug dependency

Elderly –mainstream, retirement programme Community education programme – concert hall

Secure settings: prisoners Family visits Young offenders/institution Probation hostel Secure hospital (MH/LD)

Brain injury – young adults – wheelchair Women's refuge (women and children) in community setting Mixed community group - physically disabled and non-disabled

Children: learning disabilities Emotionally and behaviourally disturbed Autism Behavioural difficulties Deaf and severe communication disorders Secondary special school Visually impaired Dual sensory impairment

In: Schools, Community centres, Prisons, YOI, Hospital, Concert hall education centres

Type of session and frequency

One-off workshop -2 hours (most) Weekly - 10 weeks (all few) 6-8 weeks 12-18 months 5 years Monthly - 1-2 years Intensive block - 1 week 7 days Weekend activity Intensive Block followed by weekly (x1) Minimum 3 needed for progression 1:1 sessions - autism Profound learning disabilities Challenging behaviour During group residencies Group size: Smaller needed- behavioural difficulties in school -YOI -Autism

-LD

8-10 if with carers too

15 best in prison 6 AMH No more than 14 5-6

Room size can determine group size All can be dictated by funding

Type of gamelan and tuning

Often use what there is, also select for different reasons Central Javanese: Slendro – harmonious – all notes fir so enhance group feeling Too lovely and nice Easy and quick success Good to improvise with

Pelog less satisfying initially Takes time to control Clashes More interesting More variety More 'edge'

Sundanese

Sounds more familiar to western ears Easy to dismantle repertoire to work with Fits well with western instruments when combining

Balinese angklung tuning works well 7-tone more difficult

Instruments

Central Javanese – most used Resonator instruments good to use when need more sound – slenthem, genders. More vibrations than saron and demung Balinese Very noisy – damping much more important

Metal -Bronze – nicer sound, heavy -Iron, harsher sound Spiky instruments Lighter, easy to move around

Set-up issues

Good preparation important for success – information on special needs needed -Appropriate selection of participants helps – effective support from organisation to do this needed

Relationship with hosting organisation or institution important for success/failure – difficulties affect work (prison)

Institution (prison, secure hospital) staff – enthusiasm and support needed for success -positive attitude -Involvement Voluntary participation important for success – mandatory was unsuccessful Gamelan + musicians going to participants (YOI) rather than other way round important to success Have to comply with organisations evaluation procedures Room size can determine numbers

Funding/ownership

Bought by orchestra outreach programme, and sessions paid for Bought by council for adult resource centre (ALD) Created business for gamelan and special needs work Got charity funding for gamelan work G as outreach part of performing gamelan group Had gamelan specially made for setting (YOI)

Co-workers

Useful can identify responses in SLD Can be negative and disruptive Include- can break down resistance to G Importance of relationship with setting/institution to success of work Positive staff, involved, supportive

Gamelan combined with other things

Combined media projects often Puppets -Music to accompany with story Make up own Links to culture Storyteller Create music to accompany a story Adapt traditional music to accompany Artwork Making puppets Parts of story Dance - little Classical musicians - often linked to orchestral centres Play with musicians who are on their instruments (brass group) As part of projects working on classical piece/theme As part of project playing all instruments Guitars, songs, rap (prison)

Adaptations

Layout - change to enhance group feeling Encourage interaction Put in circle Position according to playing needs – chairs, standing etc Spacing important to visually impaired, keep same Beaters Use soft percussion beaters (save ears) Swap mallets around Adapt instruments – move bars around – visually impaired As don't have to hold the instrument is very versatile

Tutor's own training

No training to teach gamelan Learnt by watching others Shadowed other teacher Talked to others Tried their ideas out Thinks people should have training Should have lot of experience of playing in order to teach Teaches with very little own experience

Has training in community music Music workshop skills Community education

No training to work in special needs Assumption that as musician can do it, work with anyone Reflects idea that special needs aren't important Terrified, of unknown Learnt from asking SN teachers involved for feedback

Some training in special needs Since starting from organisation Specific training for music with SN For gamelan and hearing impaired

Other relevant training:

Career as social work Intro to music therapy Studied learning styles of gamelan in Java Learnt psychoanalytic ideas

Did not learn to play gamelan properly for self Learnt by immersion Not much experience of traditional gamelan

Learnt with Javanese teacher in UK

How teach and philosophy

Tutors have many reasons for choosing type of music and approach used – based on participants working with, and on tutor style/personality Tutor as facilitator not teacher

<u>Traditional music</u> Aurally with numbers Not with learning disabled Don't start with this Could make participants aware of limitations Get everyone to sing balungan Use ideas from trad – cycles

<u>Creative music</u> Start with how to make a beautiful sound Experiment with damping Explore and improvise first Completely free Let group create music, decide (adult) Tutor facilitates musical expression Keep spirit of gamelan in creations SN – listen to sounds, use to create story

Many MIX traditional, improvisation and composition Structured activities useful if been doing lot of free work before Tutors hold traditional musical ideas in head, whilst facilitating creative work Combine SN group with mainstream in performance – positive for all Produce a CD of pieces created, for participants to keep Not everything about G unique – could get same outcomes with other music (x1)

Musical structures and techniques used

Traditional Traditional structures/elements (many use) Very simple cycles (SLD) Importance of a pulse Start from bottom – gongs and beat build up (CLD) Start from top -melody and add in parts (CLD) Introduce instruments slowly using this Learn simple trad piece - 2 note- lancaran Start with 2 note piece, then 4 if can etc, as in mainstream Use children's names to teach bonang imbal, learn lancaran melodies Pair work - bonang and rhythmic Creative-staff and child (HI SCC) Songs - reach one - helps link to culture VI very responsive to Creative Start with how to make a beautiful sound Experiment with damping - incorporate it in the music Improvisation Free With musical instructions Using traditional ideas as starting point Use instruments on non-traditional manner Use traditional roles of instruments Composition Use improve to develop composition Write own trad-style piece Split into small groups to create piece, put all together? Use a story to create composition Use classical theme Musical exercises Pair-work Musical concepts eg pitch today Tutor facilitates musical expression Tutor holds traditional musical ideas in head, whilst facilitating creative work Many mix traditional, improvisation and composition Structured activities useful if been doing lot of free work before - reassuring, know where are with structure Learning disabilities specific ideas Range PSLD – autism, Tactile – feeling vibrations, sound awareness (around kenong) Gong baths Soundboards Eye-pointing games for helpers to play Movement triggers

Simple starting stopping cues

Create own musical and physical signals to structure playing Rhythmic games

Familiarising call-response Conducting

Aims of work

Musical

learn about Indonesian music

- Learn pieces
- Composition
- Develop creativity
- Have a musical experience
- performance

Educational

- develop 'key-skills'
- develop ability to learn (new way)
- develop interest in the arts
- engage with wider education
- learn transferable skills
- rehabilitation

Well-being

- enjoyment
- have a positive experience
- reduce isolation
- improve mental health
- increase self-confidence
- increase motivation
- sense of achievement

Social skills development

- develop autonomy
- choice-making (SLD)
- develop relationships (inc parent-child)
- 'pro-social behaviours'

Communication skill development

- Concentration
- Self-expression
- Listening
- Ability to interact

Team-work skills

- Increase group awareness
- Encourage participation

Sensory awareness

- Explore sensory aspects
- Sensory stimulation
- Make connection between sounds and movements
- Explore sounds
- New challenges
- Develop physical coordination

In special needs – some same as in mainstream work and very varied depending on who working with, general themes across groups:

Playing Gamelan as route to other music/ instruments/groups

Benefits of playing

Musical

- Improve and learn new musical skills
- Regain confidence in musical abilities (musician)
- Way back to music (musician)
- Take new musical role
- Gain a musical identity
- Way to other musical activities/instruments
- Unfamiliarity means level playing field

Social

- Way to meet others
- Make new friends
- Mix with people normally wouldn't
- General life skills

Group skills

- Listening
- Tolerance of others
- Conflict resolution
- Cooperation
- Work as team
- Group spirit

Well-being

- Raise mood
- Stress release
- Cathartic
- Calming, refreshing, relaxing
- Increase self-confidence, self esteem
- Sense of achievement
- Experience being able
- Connect to others (human)
- Decrease self-harm
- Enjoyment

Communication skills

- Listening
- Self-expression
- Express self in music
- Feel heard and valued

Transformative experience

- Break down resistance
- Go through blocks
- Allow self to participate, be enthusiastic
- Naughty to responsible child

Moving in synchrony

Therapeutic: qualities and approach

- Raises people's moods
- Group flow

- Hypnotic, semi-trance
- Cyclical nature
- Not for therapy
- Is therapeutic but not music therapy
- Shows if potential to go on to MT

Etiquette and tradition (views on)

All add to/generate the respect of the instruments and music

Tradition

Important to link the gamelan to the tradition and culture it comes from Can become devalued if separated from this Keep scholarship of the music at whatever level Needs to be taught by people who know this

<u>Etiquette</u>

Important to tell people of it (depends on SN what/how understand) Not necessarily enforce (depending on who) Caution when explaining – depending on who

Appeal of instruments

Genuine/'real' instruments

Look expensive

Accessibility – ease of playing Easy to produce sound Is clear how the sound should be made Simple 2-hand (1-hand) coordination

Physicality of the instruments Robust, solid On floor, they stay, you move Physical playing movement Tradition layout – pens Can appeal to masculine – physical, percussive (EBD boys)

Sounds Initially weird Unusual, interesting Pre-tuned Harmonious (slendro) Sound quality – beautiful, unusual Range of timbres and tones (HI) Vibrations – can be felt (HI) Powerful resonance, long Overwhelming sounds

<u>Multi-Sensory appeal</u> Visual - Enticing – draws people in – colour, shapes, carvings Looks exotic Unfamiliar Lack of connotations, preconceptions Vibrations can be felt Tactile – feel carvings (VI) Woody smell (VI)

Appeal of music

<u>General</u>

Easy to play with no musical experience Can have quick and easy success Lack of associations, levelling Equality in the ensemble Accommodates different learning styles – learn through doing Can try out different roles as musicians (and as group members) Can do traditional, free, structured Is community generative

Traditional

- Easy to play simple piece
- No musical experience needed
- Can keep extending complexity (start with 2 notes)
- Adaptable structure
- Has an inherent discipline
- Structure requires listening rely on others
- Is community generative
- Unfamiliarity means level playing field
- Equality of ensemble
- Lack of conductor connect through listening
- Easy to understand
- Learn through doing
- Accommodates different learning styles can learn through doing
- Emphasises group experience
- · Lack of notation develop core musical skills
- Repetitive chance to learn
- Repetitive relaxing, comforting
- Can try different roles in music (musicians)
- Gives positive performance experience
- Regular pulse relaxing, calming
- Can transport one...

<u>Creative</u>

Good for free work Improvisation Composition

Importance of group

- Instant group activity
- Inherently group music
- Need to work as group to play music
- Learn group-work/communication skills
- Importance of communal experience
- Soloists resented
- Can't take home and do on own need others to do it

Tutor's personal experience

Importance of group and sense of community for them

-liked social aspects

-attracted to group nature of the music

Natural progression from community music work to use gamelan

Wanted to work with people and music

Enjoyed working with special needs and g - led to confidence

Own initial enthusiasm for gamelan -Loved it -Positive experience -Gave up own instruments of gamelan -Way of rediscovering music for self -Learnt just for own enjoyment -Loved it when 'got it' Negative first experience off-putting Not taught well Didn't like it Sounded out of tune

Initially played and taught whilst working out what really wanted to do Finds performance less frightening than in own instrument (hidden in group) Uses own responses to gamelan to notice clients' responses Very little knowledge of traditional gamelan music

Not enough to teach

Doesn't see self as gamelan teacher

Is composer – using gamelan techniques in own orchestra composition and gamelan composition

Importance of 'pre-supposed knowledge' can play anywhere – explains popularity Sees gamelan as 'community music'

Range of abilities

Why tutors use it:

Accommodates range of abilities – different special needs Can work with whoever comes Something for everyone Can still create a type of traditional piece with this range Different playing actions can be accommodated With equal importance of parts, all can be 'good' at it

Mixed abilities

- Caters for all levels
- Equal importance of parts
- Different playing actions
- Structure of music lends itself to
- Work with whatever there is

Difficulties – negative outcomes

Sounds

- Too noisy,
- Overwhelming
- Over stimulating
- Don't like

Unfamiliarity

- Can be barrier
- Suspicion of 'foreign'
- Irrelevant/alien to own experience
- Racist attitudes
- Fear of unknown
- Not 'proper' music

Instruments

• Difficult to access physically

- Difficult to play if only have small movements
- Difficult to take care of
- Infantilising sitting on floor
- Mechanical disengaged hitting
- Seen as special needs instruments and music, therefore of less worth
- Seen as special needs instruments as culture/heritage not known about

Conflict with hosting institution

- YOI need to challenge authority
- Ethos of gamelan as odds with discipline of place

Performance

- Detracts from process
- Difficult to perform in front of peers

Difficult for solo instrumentalists to adapt to group ethic

Participant responses

(as reported)

- Enjoyment
- Immediate enthusiasm, amazement, fascination (overcomes fear)
- Positive effects calming, relaxing, feel chilled afterwards, supportive
- Distracts form difficulties, transports, spiritual state
- Release of aggression
- Is therapeutic

Client-group specific

Prisoners

- Appeal of freedom in playing
- Enjoyed improvisation most
- Excited by new opportunities

LD teenagers

• More open than general teenagers, less image issues

Multi-sensory impaired

- Enables new responses
- Use vibrations
- Works with different senses

Autism

- Sustains involvement
- Enthusiasm

EBD

- Well-behaved, positive
- Performance gave opportunity to behave differently

VISUAL IMPAIRMENT

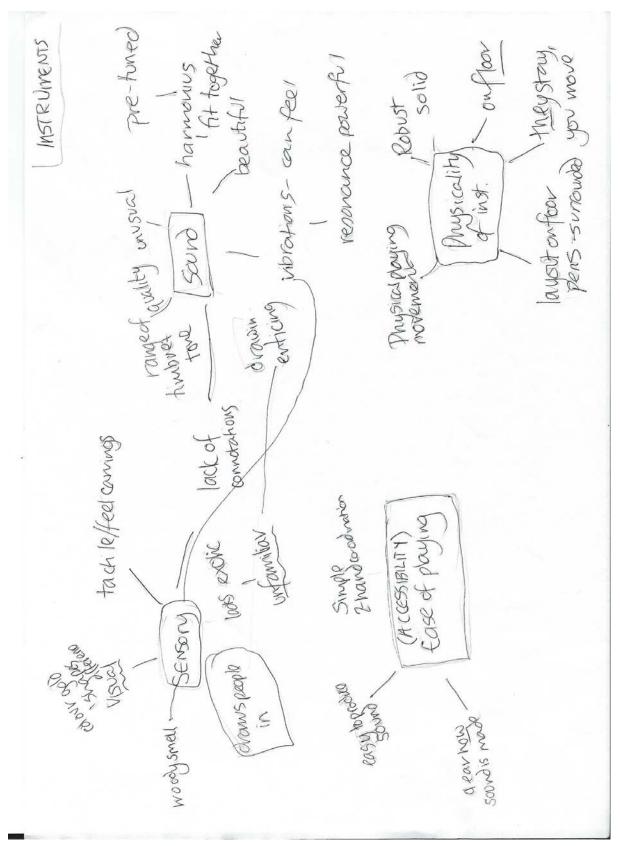
- Very good at listening and responding
- Skilled at aural cues needed in traditional pieces

HEARING IMPAIRED

- Spontaneous movement and dancing
- Like feeling vibrations in body

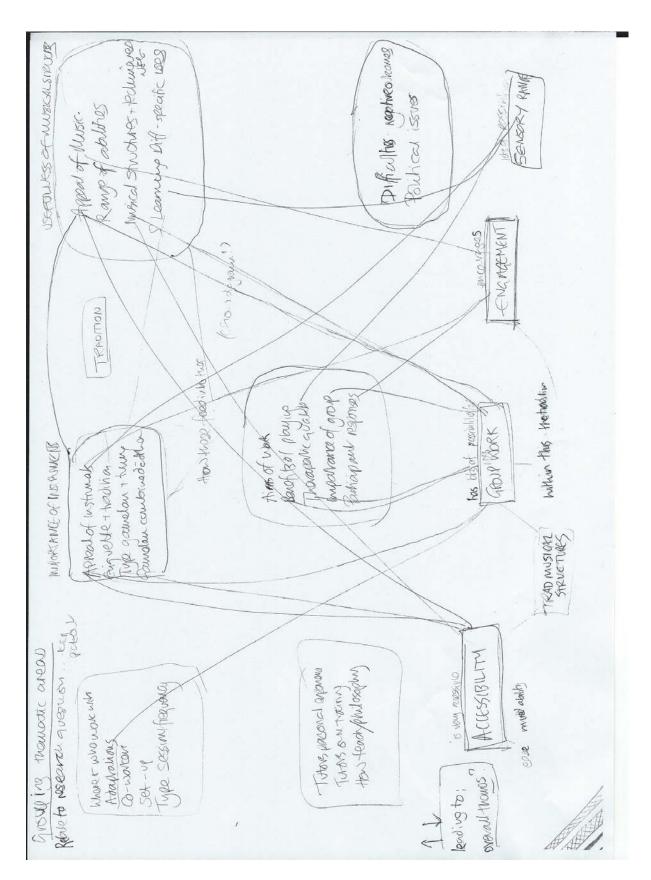
Political issues

Disabled people having less access to music-making Contradicts negative attitudes to disabled playing music Sense of musical deprivation – YOI way to learn and play music G as part of humanising an institution (YOI) G as institutionalised as participants – (ALD) Lack of care transferred from one to the other Seen as something 'exotic and easy' – gamelan for special needs as 'can't do other things'



Appendix H: Examples of thematic grouping

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Appendix I: Example of Key themes development

Appendix J: School project forms

Pupil Information Sheet <u>The Gamelan Therapy Project</u>

Helen Loth is a music therapist who works at Anglia Ruskin University.

She is bringing some Gamelan instruments in to the school and will be running some music sessions using them. This will be called the **Gamelan Therapy Project**.

The gamelan is a big set of percussion instruments from the country of Indonesia. They are very easy to play and you don't have to be very musical to take part. Here is a picture of some gamelan instruments. If you take part in the project you will play some of these instruments.



You are invited to join a group of pupils who will meet weekly with Helen to do gamelan therapy. There will be 8 sessions, lasting about 30-45 minutes each.

Playing the gamelan together can be a way to learn more about listening to others, communicating and expressing yourself. You will also find out about a new kind of music and may have some fun!

The sessions will be videoed and Helen will write about them. She will use this in a study she is writing. When she writes or talks about this project, she will keep all information about you private. Helen might use some of the videos when she is teaching. If she does so she will keep your name and information about you private.

If you would like to take part, you will be asked to give your permission. You can tell us if you agree, or sign your name on a form.

You do not have to take part in the Gamelan Therapy Project. If you do join the group, and then decide you don't like it, you can leave. Just tell Helen or a member of school staff that you don't want to do it anymore.



Pupil Consent Form

Name of pupil:

The Gamelan Therapy Project

Section A

- 1. I (your name) agree to take part in the Gamelan Therapy Project.
- 2. The project has been explained to me and I have been given an information sheet about it.
- 3. I understand what the project is about, and what I will be doing in it.
- 4. I know that the gamelan therapy sessions will be videoed.
- 5. I understand that I can stop being part of this project at any time, for any reason.
- 6. I know that Helen will be writing about the project, and may show some video when talking about it. I understand that she will not use my real name in the writing, and will keep all information about me private.
- 7. I can contact Helen to ask her any questions I have about the project.

Signed.....Date.....

Name of staff witness

SignedDate

You will be given a copy of this form to keep

Section B

If you want to stop taking part in the Gamelan Therapy Project, please fill in the form below and return it to school, or tell a teacher or your parent who will fill out the form for you.

I[your name], would like to

stop being part of The Gamelan Therapy Project

Signed Date

Main investigator and contact details: Helen Loth, Senior Lecturer in Music Therapy. Music Therapy Clinic, Anglia Ruskin University, East Road, Cambridge CB1 1PT. <u>helen.loth@anglia.ac.uk</u> 0845 196 2663

Parent/Carer Information Sheet

The Gamelan Therapy Project

- 1. Your child has been invited to participate in the Gamelan Therapy Project as it is thought that they may benefit from extra help in the development of communication, social and emotional skills. They do not need to take part in the project if they do not wish to. They will be asked if they wish to join the project and give their agreement.
- 2. If you agree to your child taking part, they will attend a series of eight, weekly gamelan therapy sessions. This will involve playing the instruments together in a small group. The sessions will be run by Helen Loth, and will have a therapeutic purpose. Any required support staff will also be present. The sessions will be video-recorded and written up by the researcher.
- 3. There are not believed to be any risks involved in your child taking part. If they do not like the sounds of the gamelan, they will be able to leave.
- 4. Participation in the Gamelan Therapy Project will not adversely affect your child's access to the usual music therapy service in the school.

Some gamelan instruments:



- 5. It is envisaged that taking part in the Gamelan Therapy Project will help your child in various areas of development, and that they may find it an interesting and enjoyable experience.
- 6. Video recordings and notes on the sessions will be stored securely and all identifying features will be kept separately. They will be reviewed as part of the overall PhD study.

The project will be written up in the study. Information about your child will be made anonymous and all identifying features about them and the school will be changed. Video of the gamelan sessions may be used in conference and teaching presentations. Any information about your child will be treated as confidential, as above.

7. If your child begins the project and then does not wish to continue, they can withdraw at anytime. They can tell a teacher, their parents/carers or the researcher. If you wish to withdraw consent you are invited to fill out the 'withdrawal of consent' slip on your copy of the consent form and send this to the school.

The Research Project

8. The Gamelan Therapy Project

This forms part of the study: 'An investigation into the relevance of gamelan music to the practice of music therapy'. The gamelan is a set of tuned and un-tuned percussion instruments from Indonesia. They are easy to play and produce a very resonant and unique sound.

- 9. The purpose of this study is to explore the therapeutic aspects of playing gamelan. It will investigate the benefits already being experienced by participants in gamelan workshops and classes taking place with children and adults who have differing special needs. It will then look at how these therapeutic aspects can be applied in music therapy sessions with children. The study will be of value to gamelan tutors and to music therapists.
- 10. The Gamelan Therapy Project is the last part of this study and will be a series of music sessions which try out some of the ideas about how gamelan playing can be therapeutic for children who have learning disabilities.
- 11. Your child is being invited to take part in the project as they attend XXXX school, where the project is taking place.
- 12. This research is organised by Helen Loth, Senior Lecturer in Music Therapy at Anglia Ruskin University: Music Therapy Clinic, Anglia Ruskin University, East Road, Cambridge CB1 1PT. <u>helen.loth@anglia.ac.uk</u> 0845 196 2663
- 13. The study is being undertaken as part of a PhD study. The results will be published in this PhD. Parts of the study may also be published in journals and presented at conferences.
- 14. The research is being partly self-funded with some assistance from The Music Therapy Charity and from Anglia Ruskin University.
- 15. For further information please contact Helen Loth, Music Therapy Clinic, Anglia Ruskin University, East Road, Cambridge CB1 1PT <u>helen.loth@anglia.ac.uk</u> 0845 196 2663

YOU WILL BE GIVEN A COPY OF THIS TO KEEP, TOGETHER WITH A COPY OF YOUR CONSENT FORM ANGLIA RUSKIN UNIVERSITY HEADED NOTEPAPER

Parent/Carer Consent Form

Title of the project: The Gamelan Therapy Project

Main investigator and contact details: Helen Loth, Senior Lecturer in Music Therapy. Music Therapy Clinic, Anglia Ruskin University, East Road, Cambridge CB1 1PT. <u>helen.loth@anglia.ac.uk</u> 0845 196 2663

Section A

1. I agree to let[child's name],

born on.....take part in the Gamelan Therapy Project.

- 2. I have read the information sheet and understand what my child's role will be in this project, and that the gamelan sessions will be videoed.
- 3. I understand that my child can stop being part of this project at any time, for any reason and without prejudice.
- 4. I have been told about the confidentiality of the information and I understand that my child's name will never be given, and that anonymised results of the research, and video excerpts may be used for publications or presentations. All identifying features of my child and the school will be changed.
- 5. I am free to ask any questions at any time before and during the study.
- 6. I have been provided with a copy of this form and the Parent/Carer Information Sheet.

² "The University" includes Anglia Ruskin University and its partner colleges

SignedDate

You will be given a copy of this form to keep

Section B

If you would like your child to stop taking part in the Gamelan Therapy Project, please fill in the form below and return it to school.

Print name:

School Staff Information Sheet

Section A: The Research Project

The Gamelan Therapy Project

This forms part of the study: 'An investigation into the relevance of gamelan music to the practice of music therapy'. The gamelan is a set of tuned and un-tuned percussion instruments from Indonesia. They are easy to play and produce a very resonant and unique sound.

- 1. The purpose of this study is to explore the therapeutic aspects of playing gamelan. It will investigate the benefits already being experienced by participants in gamelan workshops and classes taking place with children and adults who have differing special needs. It will then look at how these therapeutic aspects can be applied in music therapy sessions with children. The study will be of value to gamelan tutors and to music therapists.
- 2. The Gamelan Therapy Project is the last part of this study and will be a series of music sessions which try out some of the ideas about how gamelan playing can be therapeutic for children who have learning disabilities.
- 3. You are being invited to take part in the project as you are a member of staff at XXXX school working with children involved in the project.
- This research is organised by Helen Loth, Senior Lecturer in Music Therapy at Anglia Ruskin University: Music Therapy Clinic, Anglia Ruskin University, East Road, Cambridge CB1 1PT. <u>helen.loth@anglia.ac.uk</u> 0845 196 2663
- 5. The study is being undertaken as part of a PhD study. The results will be published in this PhD. Parts of the study may also be published in journals and presented at conferences.
- 6. The research is being partly self-funded with some assistance from The Music Therapy Charity and from Anglia Ruskin University.
- 7. For further information please contact Helen Loth, Music Therapy Clinic, Anglia Ruskin University, East Road, Cambridge CB1 1PT <u>helen.loth@anglia.ac.uk</u> 0845 196 2663

Section B: Your Participation in the Research Project

8. You are invited to participate in the Gamelan Therapy Project as you either work with the children involved in the school, or additionally have been present in the gamelan therapy group sessions.

- 9. If you agree to take part, you will have a short interview with the researcher at the end of the series of gamelan therapy sessions. You will be asked how, in your opinion, the children have responded to being in the project, and what impact if any, the project has had in the school. If you are present in the gamelan therapy sessions, you will be supporting the children involved, according to their needs.
- 10. The gamelan therapy sessions will be videoed and written up by the researcher.
- 11. The interview will be audio recorded and transcribed by the researcher. Information from your responses will be used in the study. It will be anonymised and your name will not be used.
- 12. Audio and video recordings, and notes on the interviews will be stored securely and all identifying features will be kept separately. They will be reviewed as part of the overall PhD study.
- 13. If you consent to taking part and then change your mind, you can withdraw consent at any time by filling out the 'withdrawal of consent' slip on your copy of the consent form and returning it to the researcher

YOU WILL BE GIVEN A COPY OF THIS TO KEEP, TOGETHER WITH A COPY OF YOUR CONSENT FORM

School Staff Consent Form

Title of the project: Gamelan Therapy Project

Part of the study: An investigation into the relevance of gamelan music to the practice of music therapy

Main investigator and contact details: Helen Loth, Senior Lecturer in Music Therapy. Music Therapy Clinic, Anglia Ruskin University, East Road, Cambridge CB1 1PT. <u>helen.loth@anglia.ac.uk</u> 0845 196 2663

- 1. I agree to take part in the above research. I have read the School Staff Information Sheet which is attached to this form. I understand what my role will be in this research, and all my questions have been answered to my satisfaction.
- 2. I agree to the audio recording of interviews, and the video recording of any gamelan therapy sessions I participate in.
- 3. I understand that I am free to withdraw from the research at any time, for any reason and without prejudice.
- 4. I have been informed that the confidentiality of the information I provide will be safeguarded.
- 5. I am free to ask any questions at any time before and during the study.
- 6. I have been provided with a copy of this form and the Information Sheet.

Data Protection: I agree to the University³ processing personal data which I have supplied. I

agree to the processing of such data for any purposes connected with the Research Project as

outlined to me*

Name of participant (print)......Date.....Date.....

Name of witness (print)......Date.....Date.....

YOU WILL BE GIVEN A COPY OF THIS FORM TO KEEP

³ "The University" includes Anglia Ruskin University and its partner colleges

If you wish to withdraw from the research, please complete the form below and return to the main investigator named above.

Title of Project: Gamelan Therapy Project

I WISH TO WITHDRAW FROM THIS STUDY

Signed: _____

Date: _____

Appendix K: School project photos



The Balinese Angklung reyong



Further photos removed for confidentiality reasons