A Turn to Listening: How New Understandings of the Listening Process Affect Approaches to Sound Art and Experimental Music

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A portfolio of original compositions and commentary submitted to the University of Huddersfield in partial fulfilment of the requirements for the Masters by Research

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Abstract

Composers and artists working in various strands of contemporary avant-garde music and sound art have identified that the role of the listener is crucial to the understanding of their work. Through a discussion of philosophical listening theories, with particular interest in the influence of technological advances, accompanied by a portfolio of original compositions that are influenced by these ideas, this projects seeks to identify why this is the case and what this says about today's western culture. The commentary traverses the dichotomy that emerges from differing aesthetic viewpoints regarding how the listener experiences sound, with a reflection on how these viewpoints relate to the music submitted in the portfolio. The portfolio of fixed media compositions, influenced by electronic drone, electroacoustic and minimalist/post-minimalist experimental acoustic works, uses minimal materials and music technology to explore elements of the listening process by bringing attention to small surface variations and near repetition. Mostly, the works are created with acoustic instruments performed by the the author/composer, recorded in a studio then arranged on a DAW with little processing. These immersive pieces find unique forms through a combination of indeterminacy, guided improvisation, process and computer sequencing. A more profound appreciation for our perceptual facilities is seen as one possible antidote to the unrelenting fast paced techno-culture that many of us live in.

Acknowledgements

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Works submitted

The works have been organised onto four disks in order to create three albums (I - III) and one disk (IV) to contain 8-channel versions of four tracks that appear on Disks I and III. Disk II contains works that have been produced by electronic sources or works in which acoustic sources have been processed by the computer heavily (with the exception of *Choir in the Atrium*).

Disk I (DVD):

Harmonica I – 11:21

Harp Fan II – 12:40

Melodica – 8:04

Glock I – 3:00

Metal Tree – 5:54

Bass Shimmer – 11:24

Disk II (CD):

They Might Say Hi, I Might Say Hey – 4:20

II – 3:41

III – 4:46

IV – 6:24

V – 2:42

Choir in the Atrium – 6:46

Disk III (DVD):

Reed Organ – 11:46

Bass Clangs – 5:04

Ghost Notes p.1 – 2:58

Ghost Notes p.2 – 1:20

Ghost Notes p.3 – 3:04

Ghost Notes p.5 – 4:20

Ghost Notes p.7 – 7:00

Glock II – 1:28

Piano Grinds – 10:37

Harmonica II – 4:22

Disk IV (DVD 8-Channel Versions):

Bass Shimmer – 11:22

Harp Fan II – 12:38

Melodica – 8:04

Reed Organ – 11:46

Introduction

This commentary explores aesthetic notions surrounding experimental music and sound art and considers them in light of a creative portfolio of works. Chapter 1 provides a discussion of the polemics of sound art focusing particularly on the writings of Seth Kim-Cohen and Christoph Cox. The chapter does not attempt to rationalise the works in the accompanying portfolio but, in keeping with the ethos of an MA by Research, follows a parallel strand. As such, this chapter presents a philosophical and aesthetic frame within which to comprehend the compositional work submitted.

Chapter 2 discusses the creative portfolio of works in light of this aesthetic discussion. This chapter does not attempt to present an overview of each work submitted but rather to tease out specific concerns within the portfolio – such as pitch, repetition and temporality.

Chapter 1

1.1 Introduction

Seth Kim-Cohen and Christoph Cox epitomise the polarized discourse that surrounds contemporary sound art. Both argue that their respective theoretical models are adequate in providing a meaningful analysis of the sonic. This essay traverses the dichotomy that emerges from their differing aesthetic viewpoints as a means of discussing what I consider to be some of the most significant and influential ideas in music[1], as a whole, since the late 1940s. Of course, not all critique of sound art is polemical, but we must examine the theories at the extremes in order to get to grips with the breadth of this aesthetic discussion. These ideas are focussed around a Schaefferian return to listening. As Pierre Schaeffer wrote, 'the art is in listening' (Schaeffer 1952, p.10). The two contemporary writers mentioned above are key to this discussion with each approaching sound from a different perspective. Christoph Cox's argument centres on the notion of sound-in-itself, whilst Seth Kim-Cohen focuses on the sound-as-text[2]. Their differing agendas can be seen through comparison of the following two statements. Firstly, from Christoph Cox:

> Why does sound art remain so profoundly under theorized, and why has it failed to generate a rich and compelling critical literature? The primary reason, I suggest, is that the prevailing theoretical modes are inadequate to it. Developed to account for the textual and the visual, they fail to capture the nature of the sonic...I propose an alternative framework; a materialist account able to grasp the nature of sound and to enable analysis of the sonic arts. (Cox 2011, p.146)

1 Including sound art, if we are not calling sound art 'music'.

2 Sound-as-text as a term is my construction, derived from Derrida's 'there is nothing outside the text', which Kim-Cohen bases his theory on.

Secondly, from Seth Kim-Cohen:

> Why does sonic art theory insist on pursuing the essentialist, phenomenological route already tested and largely rejected by art-historical accounts of minimalism? (Kim-Cohen 2009, p.92)

In opposition to Cox, Kim-Cohen asks: can music exist without its materiality? (Kim-Cohen 2009, p.16).

This commentary does not focus solely on sound art (neither do any of the writers that I draw from) and it is acknowledged that sound art as a term is erroneous – like any other label – arguably being vague and open to multiple interpretations. So *why sound art?* For me, the work that is described as sound art represents the continuation of an experimental approach to music making which has its roots in the first generation of the experimental tradition; John Cage, Alvin Lucier, Morton Feldman, La Monte Young, Pauline Oliveros, Terry Riley, and Steve Reich amongst others. As sound art is also often concerned with technology, it is equally indebted to the music and theories of early music technology experimenters[3], the most significant of which are Luigi Russolo, Pierre Schaeffer, Karlheinz Stockhausen and Luc Ferrari. There are, of course, a plethora of other influences, unique to each artist. According to Engström and Stjerna, my definition of sound art correlates with the general English-language centric understanding, whereas in Germany 'Klangkunst' (sound art) is defined more clearly as 'an expanded(/ing) concept of structure' and with little connection the musical tradition (Engström & Stjerna 2009, p.11). In my opinion, sound art discussion at its best analyses the nature of the sonic, rather than a specific (or rather not very specific) genre.

3 Many composers of the so-called experimental tradition also experimented with technology.

1.2 A Visual Culture

In the West we live in a visually dominated culture. This impacts on our experience of sound. Don Idhe draws our attention to the relation between light imagery and knowledge in the English language (and in most Indo-European languages) writing that,

> When one solves a problem he has had the requisite insight. Reason is the *inner light*. There is *a mind's "eye"*. We are *enlightened* when informed by an answer...Vision becomes the root metaphor for thought, the paradigm that dominates our understanding if thinking in a reduction to vision (Ihde 2007, p.4).

The prominence of the 'visual' in philosophy has been evident since Aristotle. Ihde writes that, 'above all we value sight... because *sight is the principle source of knowledge* and reveals many differences between one object and another' (Ihde 2007, p.7). Traditionally, sound in western philosophy has only the limited potential of adding to sight information. Voegelin writes that sound has been 'sublimated to the visual and its linguistic structure. In that position, sound is left to describe and enhance but never to do and become' (Voegelin 2010, 32).

Marshall McLuhan argues that the visual emphasis has been caused by the advent of print and the ability to record and copy printed matter. He believes that this has had a profoundly restricting effect on our perceptual faculties, reorganising them so that we can only understand and conceptualise the world along linear lines, where 'everything is arranged according to the vanishing point' (McLuhan 2008, p. 68). However, this is not how the aural world ideally functions. McLuhan writes: 'acoustic imagination dwelt in the realm of ebb and flow, the *logos*… everything is happening at once, in a state of constant flux' (McLuhan 2008, pp.68-70). Listening is important and should not be

overlooked. Unlike the visual, sound is immersive; we hear with our whole bodies in all directions. David Toop writes that sound '*in-vades* our experience' (Toop 2001, p.81); we cannot close our ears. As a species, we have developed an extremely refined hearing mechanism which enables us to distinguish very small variations in our sound world. This 'refined awareness of resonance and its atmospheres' (Toop 2006, p.63) is one of the ways in which we negotiate our environment and survive.

The dominance of the visual in western culture has influenced our traditional methods of analysing music. All too easily we focus on the visual manifestation of sound – the score, the performers, the performance setting, the sound source, the documentation – rather than the sounds heard. It is with this idea of visual dominance that Christoph Cox starts his argument. Voegelin writes that Theodor Adorno also held this position:

> Adorno laments art criticism's lack of experiential engagement with the work. He talks about the distance of the aesthetic theorist from his object of theorization and blames the displacement of philosophy by science, which excludes experience and mocks the subjective in favour of objectivity that pretends to 'know everything beforehand' (Voegelin 2010, p.44).

This argument is important to consider when writing about new forms of music, particularly electronic (or technology driven) music. Traditional analysis is not meaningful for many forms of experimental music and (or including) sound art as Kim-Cohen writes: 'Sonic art is art that posits meaning or value in registers not accounted for by western musical systems' (Kim-Cohen 2009, p. 107). Traditional music is organised in 'discrete units or segments' (Agawu 1999, p.142), but it is, if not impossible, meaningless to examine much of Alvin Lucier's music for example, in these terms. It is arguable that the visually oriented model for music criticism is simply not adequate to the task of making meaningful comments about much of the most experimental music since

the 1940s.

1.3 Technology

We take for granted that technology has dramatically changed our everyday listening process. 'The mere existence of phonography – its ability to hold any one sound and keep all sounds in mind – produced a new status for hearing' (Kahn 1999, p.5). Technology is ingrained into our everyday life and has fundamentally changed the way we listen to music and the world. Phonography[4] has enabled the expansion of the range of our natural listening abilities; changes the focus-fringe ratio of hearing; allows for repeated listening (of exactly the same thing) and creates acousmatic listening contexts. Anyone dealing with recorded sound in their work should be aware of the differences that technology has had on our listening sensibilities. Recording and its associated technology is now ubiquitous in society. It is the most significant change to our experience of and approach to music since the advent of the 20th century. Technology changes how we think about making music and encourages us to lose the traditional western hierarchies that would govern our music making. These new possibilities enabled by professional portable multi-track devices to consumer apps on mobile telephones, create a new status for listening as they make us more aware of our sounding world and our listening processes.

4 In which I am including all means of amplification technology.

1.4 Listening Expands

'Matter is dissolved as technology denies inaudibility and forbids silence' (Kahn 1999, p.164).

One of the most fascinating and influential differences recording and amplification technology has had on our listening is the expanding of our auditory capacities. It involves an auditory exploration of our world to find hidden sounds. We now have access to a wealth of auditory phenomena, which in turn is expanding our creative understanding of sound and engendering new musical possibilities. Cage realised that everything is in a state of sound production commenting: 'This table, for instance, around which we're sitting, is made experiential as sound, without striking it. It is, we know, in a state of vibration. It is therefore making a sound...' (Cage cited in Kahn 1999, p.196). Amplification allows us to listen to and magnify the smallest of sounds - the 'atomic sounds of objects' (Kim-Cohen 2009, p.117).

Contact microphones allow us to listen to the resonances of objects through amplifying their vibrations. The result of such a process produces 'a listening process unavailable to direct listening [listening, unaided, live], representing, generally speaking, an important break with the latter, and illustrating the transformative power of the microphone' (Schaeffer 1966, p. 38). In the sonic art work *Listening to Donald Judd* (2007), Steve Vitiello attached contact microphones to Judd's installations in Marfa, Texas. These microphones pick up hidden resonances that the structures produce as a result of their interacting with their surroundings. These sounds become the source material for Vitiello's work, which are then processed and shaped with the computer. Alan Lamb makes compositions from recordings using contact microphones on telephone

wires, which are excited by the wind[5]. Similarly, Bill Fontana used contact microphones to amplify the resonances of the London Millenium Foot Bridge for his work *Harmonic Bridge* (2006). However, unlike Vitiello (and mostly Lamb), Fontana leaves the sounds unprocessed. Fontana's work is therefore more conceptual in nature; he is expanding our range of listening with the intention that the beauty of these naturally occurring hidden sounds may astound us as listeners. The sounds Fontana captured were fed live into the Turbine Hall of the Tate Modern and in to the Main Concourse of Southwark Station of the London Underground, thus exploring the sonic implications of those spaces too[6].

Our listening has also been expanded by the ability to detect soundwaves that are outside of our normal hearing range, namely infra and ultrasounds. Idhe gives the example of listening to whalesongs which are in the infrasound range. By compressing the time of the whalesong we are able to raise the frequency into the human hearing range. Idhe writes that, '...without both amplification and time compression, humans simply would not be able to hear these songs' (Ihde 2007, p.xv). Christina Kubisch in her work opens up a world of audible electromagnetic waves by developing techniques for magnetic induction. Kim-Cohen writes that, 'the service provided by Kubisch is not the one typically assigned to composers, painters, and poets, but rather that of scientists, educators, and whistle-blowers: to alert us to the presence of previously undisclosed facts.' (Kim-Cohen 2009, p.110). Like Fontana, Kubisch's work with technology challenges our traditional ideas of authorship and composition. In Kubisch's *Electronic Walks* (2003) that have taken place in numerous cities across the world, she is not

5 http://wiredlab.org/wires/audio-recordings/

6 http://resoundings.org/Pages/Harmonic_Bridge1.htm

involved with composing the sounds, nor when they are heard. The listener is invited to create a unique journey, discovering the mysterious sounds of ATM machines, fluorescent lights and other 'unheard' technologies that make up our cityscape. Technology has made us aware that 'once silent realms are in fact realms of sound and noise' (Idhe 2007, p.4). We are even able to listen outside of the Earth's atmosphere, into space. On the space weather radio website we are able to listen to radio echoes from and satellites and meteors[7].

1.5 Acousmatic Listening

Through recording and amplification we are exposed to a form of acousmatic listening every day (through broadcast technology for example), which can radically alter our listening experience. For some listeners, this allows for a more abstract and richer experience of music. Defined by Murray Schafer as 'listening to sound without any visual clue to its source' (Schafer cited in Licht 2007, p. 38), the concept of acousmatics was first introduced by Pythagoras when he is purported to have given lectures behind a curtain so that his students could not see him speak. He wanted his students to listen more intently. Whether this curtain was real or metaphorical is still debated, nevertheless the concept of the 'acousmatic' was taken up by Pierre Schaeffer and incorporated into his theories on musique concrète. Acousmatic listening helps us readdress our visual domination: 'Radio and recordings, gives back to the ear alone the entire responsibility of perception that ordinarily rests on other sensible witnesses' (Schaeffer 2004, p.77). Schaeffer believed that this gives us access to a purer way of listening, 'the dissociation

7 http://spaceweatherradio.com/

of seeing and hearing here encourages another way of listening: we listen to the sonorous forms, without any aim other than that of hearing them better' (Schaeffer 2004, p.78). Kim-Cohen describes this as the '…"blind" experience of listening' (Kim-Cohen 2009, p.10). Proponents of acousmatic listening believe that seeing the source of a sound can only distract from the listening experience as it strengthens our inclination to know the causality of the sound. Knowledge of the cause stifles our imagination and immediately creates meaning as it remains connected to language as Schaeffer explains:

> If you think trumpet, you are still stuck in language...[this] leads to music heard as a "language of things"...a homonymic though deponent form of the language of words. If you perceive "trumpet" you make the utterance of the word through the intermediary of the sound "trumpet", and the sound phenomenon can do nothing other than to *signify* the object trumpet. The sound of the trumpet simply names the object (Schaeffer 1952, p.121).

For Schaeffer, the recognition of an instrument is the lowest level of signification from which all other extrinsic meanings are derived. This is a process of abstraction, whereas Schaeffer wanted to experience the concrete. Dennis Smalley, who considers extrinsic meanings are perceptually unavoidable, finds that the acousmatic presentation of sound can allow the composer to 'play' with different levels of identification. Smalley maintains that:

> There is quite a difference in identification level between a statement which says of a texture, 'it is stones falling', a second which says, 'it sounds like stones falling', and a third which says, 'it sounds as if it's behaving like falling stones'. All three statements are extrinsic connections but in increasing stages of uncertainty and remoteness from reality (Smalley 1997, p.110).

1.6 Repeated Listening

Before recordings every musical performance was unique. Recordings allow us to hear the exact same thing over and over again. To the thoughtful listener, the experience of listening to a recording is profoundly different to that of attending a live event.

Michael Pisaro writes that:

> A concert is a series of moments in which something indefinable passes through sound and between people. The moments are sensuously immersive (sights, sounds, feelings, smells, tastes), but impermanent. But you have a relationship with a recording. It can be a brief relationship – and can then somewhat resemble a performance. But the best recordings are lasting in their own particular and repetitive way (Pisaro 2009).

Repetition within a work allows us to hear the repeated event in more detail, from more 'angles', and also has a psychological effect. The highly repetitive acoustic music of Steve Reich and Philip Glass works with these effects. However, recorded loops are perceivably different. The *exact* repetition that recording allows causes absolutely no variation in the actual sound to occur, however, as our perception of these loops shift, we notice a kind of change in the sound, and are able to say objectively that we can hear new things within the sound. It is also thought that repetition makes it possible for us to forget about the causality of the sound. Identifying causality is a strong natural curiosity but repetition, for some at least, can exhaust this curiosity. We are no longer interested in where the sounds have come from, but more, *the sound*, or in Schaeffer's words the sound achieves 'a sort of identity for itself...there is no longer event, but music' (Schaeffer 1952, p.11). We listen in a manner that Schaeffer termed 'reduced listening'. Through recording and repetition we have a sound object that is no longer fleeting but through repetition can be analysed and through analysis can perceptually change in time. Sounds become objective things.

1.7 Focus-Fringe

The act of recording is not objective, it is inherently creative and the microphone 'listens' differently to us. One effect of recording, which is interesting in a study of

listening, is the change in the focus-fringe ratio.

Our hearing, and indeed all other sensory perceptions, is highly subjective: ‘Every sensory interaction relates back to us not the object/phenomenon perceived, but that object/phenomenon filtered, shaped and produced by sense employed in its perception’ (Voegelin 2010, p.3). Through our intentions, conscious and unconscious, we focus on certain sounds and filter others; we search for signal over noise. This tendency is so strong that some of us will find signal even when there is none. Merckelbach and Van de Ven carried out an experiment in which students were told that Bing Crosby's *White Christmas* was hidden within an extract of noise that was played to them. They reported that one third of students could hear the tune despite the fact that it was just white noise. It is believed that this could be associated with our tendency to find meaning in random patterns (Merckelbach & Van de Ven 2001). Our hearing is affected by intention and purpose, Schaeffer termed this ‘intelligent listening’ (Schaeffer 1966, p.37).

The microphone however, has no intentionality, it has no capacity to favour signal over noise. Idhe writes that it ‘records all these auditory stimuli without distinction’ (Idhe 2007, p.75). Recording technology has advanced so that modern equipment can be relatively ‘transparent’, however, early technology degraded the sound signal quickly. Schaeffer finds an example of our tendency to find signal in our ability to discern language (verbal, and musical) even when the natural signal has been distorted by poor recording quality and other traits (or side-effects) of recording. He asks, ‘how can we account for the fact that certain natural sound structures, completely familiar to us, appear indestructible, recognisable against all odds, through the crudest distortions and hacking about?’ (Schaeffer 1966, p.30). He continues, ‘even if today, advanced equipment gives

us a signal that is reputed to be accurate, Edison's experiment remains: the ear, despite a distorted signal, gets the essential part of the message' (Schaeffer 1966, p.30). Schaeffer also notes that the microphone hears the focus-fringe of source-reverb differently to our ears (Schaffer 1966, p.36). In a live situation (musical or not) sound reaches us directly from the source, which is directional/localised, and indirectly, which is omnidirectional. What is more, when listening to a live orchestra for example, the visibility of the sound sources allows us to focus better on those sources, and the reverberation of the room becomes fringe: largely unnoticed unless we focus on it. The microphone cannot distinguish between the directional and omnidirectional; they are conflated. So the microphone is without intention but is not objective. In Francisco Lopez's words, microphones are 'non-neutral interfaces... a first transformational step in the recording process' (Lopez 2004, p.84). Lopez uses environmental recordings but alters them with the computer. For field recording enthusiasts, the sound of the field is interesting enough in its own right (with or without extrinsic connections). Field recording can be seen as a continuation of the soundscape tradition but is not usually ecologically focussed.

Considering the matters that have been discussed thus far in this commentary, it can be said that field recordings allow us to listen to natural environments in a new way, quite different from being actually in the place, even if they strive for a natural representation. The Japanese composer, Toshiya Tsunoda, works with field recordings of inert matter, recording tiny vibrations that usually we are not able to here and captured with contact microphones. Often he eschews sound processing in favour of a more realistic production of the sound source. The letting-be of sound in field recording represents a level of appreciation of naturally occurring sound perhaps not seen to this

extent before in a music community.

1.8 Traditional Musical Listening

Technological developments have allowed us to listen in new ways and they have also encouraged a fascination with sound that is not necessarily musical in the traditional sense. In order to make sense of new approaches to musical listening we must first address that which came before. For the purpose of this commentary, I call this 'traditional musical listening'. This is a type of listening that is intrinsically tied to the musical language used traditionally in western music, which itself as mentioned previously, is married to the visual representation of music: the score.

> The institutions of western music (including notation, instrumentation, concert protocol, the consolidation of music's theoretical methods) have captured music in and as a numerical sign system, a system in which phenomena are signified as values of pitch, harmony, duration, and rhythmic organisation. This valuation of musical effects represents (e)valuation of certain effects, of certain musical elements, over others. (Kim-Cohen 2009, p.96)

Even when a score has not been part of the composition process, in much pop music for example, if a traditional musical language is employed, it has come about through this visualisation. Musical language applied traditionally is used in a poetic sense, and it creates signs: 'A sign is something which stands to somebody for something in some respect or capacity. A piece is a sign that in some way translates, explains or develops a previous sign, and so on, in a process of infinite or unlimited semiosis' (Agawu 1999, p.146). Traditional musical listening occurs most strongly with those who have at least some music theory knowledge, but the broader concepts are still applicable to people with none. With knowledge when listening to a piece of music you are listening to the language of the music, it is communicating through a system that is

understood: ‘You appreciate its sonic material in relation to the systemic understanding of its composition’ (Voegelin 2010, p.71). Traditionally music plays upon the listener’s expectations and an understanding of the rules makes these expectations stronger. Voegelin writes,

> Sounds in this sense become pure knowledge; relevant and justified in relation to the context they are played within. Such a systemic listening establishes the idea of a ‘right' sound and proposes notions of beauty and meaning in relation to a pre-existing vocabulary' (Voegelin 2010, p.72).

This can be seen as a limited use of listening, in that it ignores the nature of listening as described by McLuhan (listening is not linear). Through the use of voice-leading and functional hierarchies the traditional composer hopes to lead the listener down a set or at least well-established path. In many examples of experimental music, teleology is addressed differently. For example in minimalism the ‘collapsing of voice-leading and functional hierarchies is one of the most characteristic features of minimalist tonality – two dimensional tonality which seems even at its most blandly consonant, somehow flat and without perspective...’ (Fink 1999, p.127). Instead of a driving force of traditional teleology (which works through the listener's expectations) western music, after the first generation of experimental composers, has been set free thus liberating the listening experience. Sound art takes anti-teleological sound/music to its logical conclusion: ‘Unlike music, which has a fixed time duration... a sound piece, like a visual artwork, has no specified timeline; it can be experienced over a long or short period of time, without missing the beginning, middle or end’ (Licht, 2009, p.3). Installations allow the listener to enter into the sound piece at any point in the work as there is no pre-defined beginning or end. Any successful installation art has to be designed for this way of experiencing sound.

1.9 Listening is Generative

> What I hear is discovered not received, and this discovery is generative, a fantasy: always different and subjective and continually, presently now. (Voegelin 2010, p. 23)

We have seen above that perception is subjective. Let us take this a step further and question how perception is generative. In Merckelbach and Van de Ven's 'White Christmas' experiment we have seen that people are capable of hearing melodies that are not present in the sound. Similarly, David Toop recalls composer and pianist Tadahiko Imada's account of an early Showa period (1926-1989) custom of gathering to hear the sound of a lotus flower blooming at Ueno Park's Sinobazu-no-ike point in early summer, where 'the frequency of that sound is approximately 9 – 16 Hz… As we normally hear sounds within a frequency range from 20 – 20000 Hz, people were unable to actually hear the sound... But they loved and wanted to hear that phantom sound. The experience was a kind of communal auditory hallucination' (Imada cited in Toop 2006, p.46).

Since the 1950s, artists and composers such as Cage have been interested in re-evaluating the composer to audience relationship in order for it to become (more) equal. Composers were encouraging the audience to create the work for themselves. Listening in this sense can now be described as an aesthetic activity (Voegelin 2010, p.43). When functional hierarchies are not present (or subverted to some extent) the perceiver is left to find their own way through the work, as they are not being guided in a specific manner. When this is effective, the location of the work becomes indistinct, somewhere between the listener and the physical sound. The effect is akin to the experience of encountering a work by Donald Judd, as described by Alex Potts, '...a presence emerges not locatable in

the viewed object itself but in some indeterminate region embracing the viewers' internalised awareness and the object with which he or she is engaging' (Potts 2001, p.306). Bernd Schulz posits that the auditory dimension is ideal for this perspective, stating that:

> We may consider the ear to be closer to the world of the dream and the unconscious than the eye. Yet as the most sensitive organ for the exploration of reality, it connects our inner experience with the world around us. It is precisely this double perspective which is investigated to its very limits with constantly new approaches in the Sound Artists' installations (Schulz in Kim-Cohen 2009, p.116).

Schulz's explanation is useful. It takes into account the duality of this kind of work; the composition as a thing and the generative capacity of the listener.

The idea of generative music was first formed (before it was named as such) when composers started to use procedural approaches in their work. Brian Eno became interested in this concept and it became a staple of his compositional technique, terming it generative music. In the past a theoretical distinction has been maintained between the creation of generative music and the mode of generative listening. However, electronic music composer Christophe Charles involves the listener in his definition of generative music, stating that it is,

> music which would never give all of itself at once; a music where it would always be possible to hear new things, even from the same recording which doesn't change, a music which is impossible to remember completely (Toop 2006, p.121).

1.10 Ambient

Erik Satie first presented his musique d'ameublement ("furniture music") in 1920, during the intermission of a play by Max Jacob. The spoken introduction to the piece instructed the audience to,

> Take no notice of it and to behave during the entr'actes as if the music did not exist. This

> music...claims to make its contribution to life in the same way as a private conversation, a picture, or the chair on which you may or may not be seated (Kim-Cohen 2009, p.20).

Here, Satie is focussing on the listening process by asking the audience *not* to listen. He is identifying and experimenting with our passive listening mode. Passive engagement with music was not a new thing in 1920, but for a composer to prescribe this mode of listening was quite revolutionary within the context of art as it represents a dramatic move away from the concept of the composer/artist as genius, and as such, it had a significant influence on Cage.

Passive listening is the idea behind Muzak, which itself can be traced back to the 1920s. The Muzak Corporation believed in the power of background music to have a positive influence on our mood in order to increase productivity in the workplace. A former vice president of Muzak, Donald O'Neill called it 'non entertainment... to hear, not to listen to' (Kim-Cohen 2009, p.20). The concept of mood-creating-music is found in much ambient music.

> When Brian Eno applied the term "ambient music" to his activities he switched the emphasis away from making music, focusing instead on the act of listening...many forces were chipping away at the hierarchical, separated roles of producers and consumers (Toop 2001, p.40).

David Toop presents a definition of ambient music as '...music that we hear but don't hear; sounds which exist to enable us to better hear silence; sound which rests us from our intense compulsion to focus, to analyse, to frame, to categorise, to isolate' (Toop 2001, p.139). With ambient music's gradual integration into popular culture the focus on the listener has entered another social realm. It became strongly connected with 1980s and 1990s dance culture, ambient rooms were set up in clubs as a kind of refuge from the beats of the main areas. Indeed Eno did not intend for ambient music to operate only in

the background, he wanted to create an environmental tint that could be listened to at different attentional levels, or simply ignored (Toop 2001, p.119). Due to its characteristically minimal use of harmonic/rhythmic language and slow, if not static, pace the listener can make an active decision to engage with the work and generate their own path through the textures, or leave it in the background.

Ambient and Muzak both require a kind of discovery to be listened to. This idea is crucial to sound sculpture. Max Neuhaus' sound installation *Times Square* is concerned with building a space with sound, much like sculpture. It does not itself change over time, but the observer's perception of it will change. Concepts of authorship are also interesting with this piece. It is unmarked – it neither tells us of the author, nor indeed that there is a work of art there at all. The sound sources are also hidden from view. Therefore the passer-by must find it by listening, a process of discovery. There is an element of mystery only possible through the invisible presence of sound. Neuhaus does not demand engagement with the work, he sets up the project knowing it will be experienced passively by most, but it may have profound effects on those who have the delight in noticing such a strange piece of art.

Volume and complexity are also factors in ambient listening. William Brooks notes that the average listening experience is easily disrupted, but in quiet simple music even more so as it does not impress itself on the listener's attention which to Brooks gives it a fragile quality (Brooks 2007, p.109). Manfred Werder's piece *2008(1)* (Werder 2008) requires the performers to make 'in the sounding environment a hardly distinguishable orchestra sound'. When I performed this piece with the Edges Ensemble in a busy, small art gallery in Sheffield, few audience members noticed that it had even

occurred; so fragile in its quietness and extremely short duration (*a* sound) that it was easily surpassed by the environment for most.

There is a kind of passivity that Morton Feldman promotes as an ideal way of listening to his music. Feldman likens the experience to the perception of nature, listening 'as if you're not listening, but looking at something in nature; the loud and repeated sounds are akin to any unexpected natural features that might suddenly appear out of nowhere on a country walk' (Feldman cited in Nyman 1974, p.54). Jonathan Flatley proposes that we do not really appreciate the beauty of nature by actively searching for it, instead, beauty appears only to a 'relaxed, unconscious apperception in which we attain a state of "free-floating attention". Freud maintained this is the affective state for the analyst and is also how psychoanalyst and writer Adam Philips describes "boredom"…' (Flatley 2004, p.61). This idea of boredom may help us describe how a (more) passive experience of art/music may be meaningful. In the middle ages, boredom was seen as a sin (Martin et al. 2006, p.195), but from the seventeenth century, boredom in literature began to be addressed differently. In French literature it was seen as a sign of sophistication. La Rouchfoucauld described himself as a 'connoisseur of boredom' (Martin et al. 2006, p.195). For others, boredom remained a negative state, Kierkegaard wrote, 'Boredom is the root of all evil' (Martin et al. 2006, p.195). Modern definitions still differ; is it a state of high or low arousal?

Extreme durations and repetitions have the capacity to alter our state of mind quite dramatically and allow us to enter a different state of attention, which we can call boredom. Warhol once said 'the more you look at the exact same thing, the more the meaning goes away, and the better and emptier you feel' (Flatley 2004, p.69). Warhol

was fascinated by the mundane of everyday activities. He wondered if people could watch one of his very slow films in the same way as they would sit on their porch and gaze at the world passing by. Warhol's *Empire* (1964) lasts 8 hours 05 minutes and consists of (only) a continuous shot of the Empire State Building in slow motion.

Satie's *Vexations*, which appears to have been written in 1892-3 (Bryars 1983) is the earliest example of extreme duration in western art music. It requires the performer to repeat a short phrase 840 times. The best known performance of *Vexations* was organised by John Cage at the Pocket Theatre, New York in 1963 and involved twelve pianists. It lasted 18 hours 40 minutes (Bryars 1983), other performances have lasted 24 hours.

Idhe offers a phenomenological description of boredom that may help explain the relation between boredom and listening to music. In Idhe's account of boredom, he was 'attending to nothing-in-particular, and the focal core itself receded toward a limit of disappearance in the *blank stare* of boredom. I shall call this a *field state*' (Ihde 2007, p.40). In this field state attention is wide, deep and open which seems to correspond with the experience of listening to non-teleological minimal/maximal music in my opinion. Idhe also writes that in music there is a possibility of a field state, which he describes as 'listening that is analogous to the visual taking in of an entire vista. It is "full" both spatially and temporally' (Ihde 2007, p.101).

To some, boredom requires patience, but this patience is rewarded with unexpected experiences that are not possible through any other means. Siegfried Kracauer writes that if one has the sort of patience specific to legitimate boredom, 'then one experiences a kind of bliss that is almost unearthly' (Kracauer 1995 cited in Flatley 2004, p.74). Similarly, Walter Benjamin sees boredom as 'an emotional openness that is

the condition of possibility for being affected and transformed, for being and surprised by one's desires, attractions, and imaginations' (Benjamin cited in Flatley 2004, p. 53). The patience involved in the boredom state could also be seen as a waiting experience, 'the paradox of waiting that goes on in boredom is that the individual does not know what he was waiting for until he finds it, and that often he does not know that he is waiting' (Priest 2011). Priest says that in experimental music waiting is to wait for no-thing: 'And to wait for no-thing is to risk waiting for nothing, a risk that is itself charged with an ambivalent mixture of wonder and contempt, fixation and flight' (Priest 2011).

Judd and Warhol seem to be reacting against a monotonous entertainment industry that saturates our society and promises to distract us from boredom. Now, more than ever, our technological culture reinforces/enforces that boredom is to be avoided. However, entertainment, in its predictability of experience, rarely surprises and therefore perpetuates an unfulfilling boredom. Especially with increasing broadband speeds and accessibility to online social networks on mobile devices, many attention spans are becoming shorter and shorter. As such, 'modern philosophers view boredom as inevitable in a world where we are surrounded by trivia' (Martin et al. 2006, p.195). An experience of a durational work not only allows us to connect to a much vaster kind of attention, but as Flatley maintains, such an experience 'separates itself out powerfully from the means-end logic of everyday life in which time is money' (Flatley 2004, p.69). These issues were surely important to Feldman when he wrote his *String Quartet No.2* (1983); one recording lasts over 6 hours (Feldman & Quartet 2002). The recording allows for listening 'in bits' as it is placed (by necessity) over several CDs which although makes it more accessible, misses the point. It is possible that the overload of information

that we experience in contemporary culture is a large factor as to why we are interested in (seemingly) minimal stimulation and a focus on our experience through the study of perception in art. David Toop writes:

> Phantoms on the threshold of perception, almost too elusive to grasp, masked by the sounds of daily life or blunted receptively, permeate areas of contemporary sound work that are otherwise radically opposed in their philosophy. Much of the sparse, microscopic incident now common in new music, the concentration on resonance, inaudibility, inaccessibility, transparency and process, digital glitches, ghost voices, subverted mechanics and extreme bodily interiority, uncovers phenomena and layered meaning from beneath the hysterical onslaught of information, mediation and consumerism that the world has become. (Toop 2006, p.71)

Flatley proposes that Judd and Warhol were reacting to a world in which there is so much information that it is hard to be interested in anything at all, perhaps entertainment and trivia and incessant techno-communication is so pervasive and easy that we are losing inquisitiveness in our own experience. Priest writes that ‘Wallace leads us to speculate that it is more productive to imagine contemporary aesthetic tedium as a means of coping with the felt sense of senselessness that inheres in contemporary culture's poverty of curiosity’ (Priest 2011).

These feelings are also being expressed in the design community in part prompting the advent of slow design (Slowlab, n.d.). Art and design historian David Crowley reflects on boredom in relation to graphic design, writing that ‘...the instancy of digital screen-based time changes the way we experience the world. This is information at such a velocity, exacerbated by a lack of filtering or reflection, that we lose our more fragile, day-to-day, bodily experience; which helps us make sense of things and is so often lost in navigating the digital world' (Crowley n.d.). Crowley asks if it might be ‘possible for graphic design to operate as a system to slow down perception to create

silences in the noisy media world? Or perhaps even stillness' (Crowley n.d.).

1.11 Active Listening

The desire for richer perceptual experiences leads some to prescribe an active kind of listening. There is recent research on the neuroscience of music that strongly suggests that musical listening is active and reflexive:

> One of the areas of the brain that was consistently activated in listening is the Supplementary Motor Area, part of the brain that is known to be concerned with planning motor behaviour. As participants in all the studies surveyed had been required only to listen without making or preparing any overt motor response, this suggests that musical listening might be best conceived as involved in a perception–action cycle rather than in a one-way flow of musical information from the musical producer to the listener... [another study] found that when listening to 'pleasant', as opposed to 'distorted' music, one of the brain areas found to be strongly activated was the Rolandic operculum, a part of the brain that is implicated in planning vocal behaviour, specifically, laryngeal and tongue movement. Again, participants in the experiments (none of whom had formal musical training) were not being asked to respond in any overt manner to the music to which they were listening. The results of this study suggest that a more or less reflexive and involuntary response to music to which one is listening is to participate by at least initiating, though not necessarily carrying through, vocal behaviours. In other words, it is as though the automatic and appropriate response to active listening engagement with music is to prepare to participate however one can – to prepare to sing' (Cross 2010).

This demonstrates that on a basic level we are programmed to respond to music. It reminds us that listening is important in our relationship to the world. As discussed previously, listening has usually been undermined in western philosophy. Michael Purdy writes that listening has been conceptualised as 'passive and hence not of value in exerting influence', he rightfully points out that 'we often command others to "listen up", "pay attention", "unplug your ears", as if we needed some external order to force us to listen or attend' (Purdy 1986). A refining of our listening is possible when desired or needed. The listening ability in some blind people strengthens extraordinarily in certain cases and generally takes on a greater purpose.

Composers from the first generation of the experimental tradition were interested in ascribing to a more acute, or active listening sensibility and as a result this has continued to become integral to contemporary music. La Monte Young talks of 'getting inside of [the sound] to some extent so that we can experience another world' (LaBelle 2006, p.70). The approach to listening is crucial for much of Young's work. Through the reduction of musical materials he sought to gain access to the perception of minute differences in sound. LaBelle writes that by concentrating on one single event in such pieces as *Composition 1960 no. 2 (build a fire)*, the listener is able to focus on the microscopic details of perception. Young's drone works were a product of his listening: he used his ear to tune the intervals on stage. The core of Young's work focuses on overtones, harmonics, and beating. LaBelle recognises that these psychoacoustic effects 'heighten individual perception by activating the ear and its intrinsic neurophysiological functions' (LaBelle 2006, p.72).

Pauline Oliveros used the term 'Deep Listening' to refer to a heightened listening experience, writing that: 'It implies listening below the surface and also listening inwardly... you can come away with a fuller sense of variety of experiences that you can have by listening and not tuning out' (Oliveros in Toop 2001, p.250). It is integral to her composition process. Listening becomes meditation, a sustained focus on *all* sounds in the environment. As such, active (deep) listening has a profound spiritual and existential significance for Oliveros:

> I hear
> I am
> …
> The earth is also sound
> guided by sound
> and so are all things of the earth
>
> Rocks are her ears recording all of her events from the beginning

> My earth body returns to hers
> …
> I listened from the beginning
> universal process
> Only deep listening returns me to this infinite source of all beginning,
>
> (Oliveros 1993)

Oliveros' philosophy connects with Leibniz's theory of perception. Christoph Cox summarises Leibniz's conclusions as such, 'each soul knows the infinite – knows all – but confusedly' (Cox 2009, p.21). Leibniz often used an auditory analogy in his explanations, as outlined here described by Cox:

> When I walk along the seashore, my perception of 'the great noise of the sea' is clear; that is, it is fully and powerfully audible. But it is also confused, since I hear this sound as a mass and don't distinguish its elements – the individual waves – which remain obscure. Yet I must in some sense hear the individual waves, otherwise I could not hear the aggregate. Hence the sound of each individual wave must be distinct for me, though in an unconscious and, hence, obscure sense. What is clear, then, is also confused, and what is distinct is also obscure... According to this theory [of minute perceptions], each of our conscious perceptions is grounded in a vast swarm of elements that do not reach conscious thought...Each of the 'minute perceptions' that unconsciously determine conscious perception is itself the effect of causes that ramify out to infinity. Each individual wave is the result of a multitude of forces: the speed and direction of the wind, air pressure and temperature, the temperature and viscosity of the water, and so on. As a result, each conscious perception is the local registration of the entire state of the universe at any given moment. (Cox 2009, p.22).

So, each individual 'knows [and hears] the infinite – knows [and hears] all – but confusedly' (Leibniz 1989 cited in Cox 2009, p.22).

Previously when quoting Brooks above, I indicated that music that borders on silence, such as that from the Wandelweiser group for example, requires discovery. It is a music that you need to get into and active listening can often give one access to a richer experience of the work. The limits of audibility encourage the ear to listen more acutely, as Michael Pisaro (a member of the Wandelweiser group) explains:

> Once one *has* made the turn onto this strange road, a world of difference opens up. What looks like a narrow passageway from the entrance, turns out to have all kinds of byways,

> pathways, way stations — it becomes a world of its own. Small musical differences that to some might just seem like inflections (for example, the difference between a silence of 50 and of 60 seconds, or of a few decibels, or the difference in timbre between a low trombone or an e-bow guitar, or between digital silence and recorded silence) become intensely interesting to those working with them. (Pisaro 2009)

Richard Chartier's reticent use of volume in his music 'pulls the ears towards its own disappearance' (Montgomery 2005). Chartier's compositional interests closely relate to the Wandelweiser composers' in the use of space and silence. This relationship can be seen in the following quotations: 'The key element of my compositions is often located in the space that separates sounds more than in the sounds themselves' (Chartier in Chartier & Langlais 2007) and 'Silence in music was not the cessation of sound, or even a gesture: it was a different sound, one with more density than those sounds made by instruments' (Pisaro on Kunsu Shim, Pisaro 2009). Chartier's sounds 'intrude as if they belong to an extrinsic sound world that is partly withheld from the listener...Yet the bareness of the works is illusory: under the microscope that he obliges each listener to peer down, a pulsating aural life becomes apparent.' (Montgomery 2005). Chartier acknowledges different modes of listening and prescribes active engagement: 'By being almost transparent, each sound in my work is dependent upon the personal engagement of the listener, in opposition to the regular listening experience' (Chartier & Langlais 2007). His use of extreme registers, low volume, space and meticulously sculpted sound engages our perception and promotes active listening. Listening to work of this nature can often have a lasting effect on the listener, resulting in them continuing that attentiveness back into everyday life. Toop recalls Paul Schütze's words regarding Thomas Köner's *Permafrost*:

> I found that by the end of the disc my sense of aural perspective was so altered that the music seemed to continue in the sounds around me. Tube trains passing beneath the building, distant boilers, the air conditioning and the elevator engines had been pulled into concert. This effect lasted for about forty minutes during which I could not get anything to

return to its “normal position” in the “mix” of my flat' (Schultz cited in Toop 2001, p.255).

If we can accept that active listening means concentrating on intrinsic sounds, this leads to what is known as reduced listening: a more specific term that refers to a listening mode that ignores everything not concerned with the immanent features of the sound. Dennis Smalley maintains that reduced listening ‘comes about through concentrated, repeated listening to a sound event, a common activity in the electroacoustic composing process’ (Smalley 1997, p.111). Not all would hold that reduced listening is only possible through repeated listenings. However, as we have seen, repeated listenings do help us forget about (or be less interested in) the causality of the sound which impairs our reduced listening practice. Smalley goes on to explain that reduced listening, ‘is therefore an abstract, relatively objective process, a microscopic, intrinsic listening’ (Smalley 1997, p.111). Michel Chion believes that reduced listening is important ‘as an enterprise that disrupts lazy habits and opens up a world of previously unimagined questions for those who hear it... reduced listening has the enormous advantage of opening our ears and sharpening our power of listening’ (Toop 2006, p.67).

Phenomenological studies produce methodologies for reduced listening. Phenomenology offers a way for us to study the appearance of things and maintains that it ‘allows us to belong to our experience again but hopefully in a more profound way’ (Idhe 2007, p.18). It uses immediate perception alone as primary evidence, and distances itself from any other context. Central to phenomenology is the idea of epoché that ‘establishes the “phenomenological attitude” or the perspective from which experience is to be taken’ (Ihde 2007, p.29). It refers to the bracketing of experience in order to study perception only. It uses description rather than explanation to detect essences.

Phenomenology puts aside whether an object is real. It is only concerned with experience. Phenomenology is more thorough theoretically than the relatively simple idea of active listening. As Ihde explains, to listen phenomenologically 'is more than an intense and concentrated attention to sound and listening, it is also to be aware of the pervasiveness of certain "beliefs" that intrude into my attempt to listen "to the things themselves"…' (Ihde 2007, p.49). This type of listening seems at first unnatural since, according to Eric F. Clarke, '...the primary function of auditory perception is to discover what sounds are the sound of, and what to do with them' (Clarke 2005, p.3). Such causal listening is one of the factors or "beliefs" that Ihde is referring to. This inclination to identify is strong due to our survival need to make the invisible present. Like Oliveros, the phenomenologist understands that such concentrated listening improves with practice, 'as the reflective process continues, the beginning investigator begins to find he gains a progressively finer sense of discrimination concerning the things which he experiences' (Ihde 2007, p.86).

1.12 Sound-in-itself

Reduced listening and phenomenology have the tendency to promote the idea of sound-in-itself. It is quite possible that the rise of the concept of sound-in-itself is motivated by a reaction to our visually dominated culture. Kim-Cohen remarks, that 'always in vision's shadow, sound must shout to be heard' (Kim-Cohen 2009, p.94). This idea or belief has had an important effect on compositional techniques since Cage and has been supported by modern ontological readings such as Roland Barthes' *Death of the Author* (1978) which challenges the traditional understanding of authorship, arguing that

to say any work is the product of a single author alone is false and limiting; 'it is the language that speaks, not the author' (Barthes 1978, p.143). Through this the place of the reader is restored (Barthes 1978, p.143). Cage used chance, processes and the aestheticism of environmental sound to remove himself from the work to an extent. Cage, like many of the first generation of experimental composers, rejected symbolism - he did not wish to convey meanings - 'I have nothing to say and I'm saying it' (Cage in Brooks 2007, p.51). We also find references to sound-in-itself in La Monte Young's explanations of his work. The composer writes,

> I could see that sounds and all other things in the world were just as important as human beings and that if we could to some degree give ourselves up to them, the sounds and other things that is, we enjoyed the possibility of learning something new. By giving ourselves up to them, I mean getting inside of them to some extent so that we can experience another world. This is not so easily explained but more easily experienced (La Monte Young in LaBelle 2006, p.70).

Kim-Cohen relates the sound-in-itself tendency directly to misreadings of Cage that do not take into account the paradoxes inherent in his ideas, 'the intention of non-intention, the choice of indeterminate means, the artist against artists' (Kim-Cohen 2009, p.115). The basic premise of sound-in-itself (or indeed anything-in-itself) is that referentiality intrudes on our ability to experience the thing, the object, the real. Friedrich Kittler writes that the symbolic has no status as, and no material connection to, the real (Kim-Cohen 2009, p.95). In order for the real to reach us it must, says Kittler, 'pass through the bottleneck of the signifier' (Kim-Cohen 2009, p.95). Therefore the symbolic grid degrades, and transforms the real. Kittler, who was enthralled by recording technology, believed that recordings were neutral, objective, 'delivering acoustic events as such' (Kim-Cohen 2009, p.95). However, as we have already seen, recording apparatus is not neutral, it hears differently to us, it colours, transforms and possibly degrades

acoustic sound.

It could be said that sound-in-itself, a common trait of modernism, is being revisited in recent times with sound art and its general focus on the materiality of sound (texture, temporal flow, effect on materials and space) and how it is perceived. Chartier, for example, says 'my work speaks only about itself' (Chartier & Langlais 2007). Montgomery elaborates on this, maintaining that, 'Chartier's work encounters the world by confronting and refusing it. The music's strictly guarded non-referential character is a means of throwing the listener back into the experience of listening itself' (Montgomery 2005). Indeed Christoph Cox maintains that all sound art should make an effort towards sound-in-itself (Cox 2005, p.236). In part this is due to his belief that 'musical tones and works are not signifiers, not media for the expression of a semantic content. Music...[lacks] the two tiered structure of reference characteristic of words and images' (Cox 2011, p.149). Some composers/sound artists, in order to have a more direct experience of sound and thus 'enlarge the possibilities of that experience' (Susan Ferleger Brades, Gallery 2000 preface), suppress the visual in performance/installation situations. Francisco Lopez blindfolds his audience before a performance and will not situate himself on a stage; Ryoji Ikeda required a totally darkened anechoic room for his work *Matrix* (Licht 2007, p.212).

Francisco Lopez is a strong proponent of sound-in-itself, taking much influence from Schaeffer. The fact that he encourages his audience to wear blindfolds as well as performing in near darkness reflects his advocacy of the acousmatic approach. Lopez uses natural sound environments as source material, he states:

> I have moved away from the rationalizing and categorizing of these aural entities...because it encourages a perceptual shift from the recognition and differentiation of sound sources to the appreciation of the resulting sound matter. As soon as the call is in the air, it no longer

belongs to the frog that produced it (Lopez 2004, p.83).

Lopez believes that when representation and signification is emphasized the 'goal' and 'inner world' of recorded sound is dissipated (Lopez 2004, p.85). Although Lopez is creating an argument for reduced listening, not comfortable with the negative connotations of the term 'reduced', he prefers the term 'profound listening' (Lopez 2004, p.85).

Phenomenological listening (or reduced/profound listening) is problematic. Ihde points out that 'through concentrating on auditory experience, a re-evaluation of all the "senses" is implied...The very notion of an auditory dimension is problematic for phenomenology' (Idhe 2007, 21). More significantly (in the context of this commentary at least) it promotes the idea of sound-in-itself which is problematic as we will now discuss. Idhe, although he advocates a phenomenological approach, is wary of the dangers of this idea, stating that: 'Even phenomenologists have been misled to take the musical experience as one that is disembodied and "separated from its source" as a kind of "pure" auditory experience' (Ihde 2007, p.60)... 'To simply take the thing alone without raising the wider question of how things present themselves in terms of a situated context is to allow the illusion of a thing-in-itself to occur. The thing never occurs simply alone, but within a field, a limited and bounded context' (Ihde 2007, p.73)... 'The philosopher... must eventually also listen to the *sounds as meaningful*' (Ihde 2007, p.4). Merleau-Ponty expanded phenomenology to maintain that in perception all senses work together at once, are influenced by past experiences, future expectations and social context. 'We find in perception not atoms of sensation or pure sense data, but nodes of 'meaning' which emerge as a foreground (through their proximity to the body and its

interests), against the background depth of the whole perceptual field' (Crowther 1982, p.139). He believed that art happens by the complex nature of creative perception, which makes meaning(s) in the world. Crowther writes,

> Working in a medium enables the body to continue the creative stylizing process begun in the artist's perception itself, in order to concentrate the 'scattered' meanings found there, and make them exist in a unified concrete form. It brings his own perceptual style to a point of consummation' (Crowther 1982, p.142).

For Derrida, meaning is created through a process of differentiation. Every thing is distinguished through its relation to other things, to everything it is not, therefore there can be no thing-in-itself (Kim-Cohen 2009, p.14).

As we have seen in the previous section, recording and the acousmatic approach is expected by many to aid reduced listening and therefore listening to the sound-in-itself due to the fact that the listener does not see the sound source. It is argued though, that the acousmatic experience does not necessarily enhance this effect. Intention affects recording and production is always a creative process. Recordings can be seen as inherently symbolic. To the discerning listener (and especially the music technologist), production values/styles are identifiable and with them are encoded meanings and signs that either can enrich or distract from our listening experience. This effect is most strong and consistent within popular music (where indeed semiosis in general plays a huge part in conscious and unconscious understanding of the music). It plays a part in our appreciation of the authenticity of a recording artist. Kim-Cohen uses the example of country blues recordings. The quality of the recording such as the crackles and distortion, the restricted frequency range, the mono sound image, lend themselves to indicating when the track was recorded. As (early) blues is very much a phenomenon of a specific time, place and people, these recording traits are very important in our

understanding of authenticity. Popular music is, of course, an exaggerated example in the context of this commentary. However, recording is never transparent; it is always laden with extra-musical messages. As is the case with Pierre Schaeffer's endeavours, the recording/playback technology of the time creates its own 'characteristic timbre' (Schaeffer 1966, p.18). Attali from an economic, socio-political perspective also argues that all recordings must signify. For Attali, recordings commodify and deritualize music (Attali 1985, p.89). Music cannot offer sound-in-itself because of it is always functional and meaningful.

> In fact, it [music] has no usage in itself, but rather a social meaning expressed in a code relating to the sound matter music fashions and the systems of power it serves...the "meaning" of the musical message is expressed in a global fashion, in its operationality, and not in the juxtaposed signification of each sound element...What must be constructed, then, is more like a map, a structure of interferences and dependencies between society and its music' (Kim-Cohen 2009, p.104).

Kim-Cohen is adamant that sound-in-itself is impossible, paraphrasing Derrida, 'there is no extra-music' (Kim-Cohen 2009, p.107). His conceptualism goes so far as to suggest that in the case of *I am sitting in a room* (1969) by Alvin Lucier, it could most richly appreciated if not listened to (at all).

1.13 Conclusion

Listening is complex and difficult to analyse since 'the principle end-product of my listening activity is a series of fleeting, largely uncommunicable mental images, feelings, memories, and anticipation' (Sloboda in Bundra 2006, p.6). As we have seen, it is possible and plausible to identify different listening modes and analyse their effects, however to take these as completely discrete would be a fallacy. We have access to different listening styles and it could be that to an extent we can control which mode we

choose. This is how Ola Stockfelt explains the listening process:

> Which mode of listening the listener adopts in a given situation depends mainly on how the listener chooses to listen – that is, which mode of listening he or she chooses to develop or adopt. And yet this choice neither totally free nor accidental...The mode of listening a listener can adopt is in this way limited by the competences in modes of listening that he or she possesses or can develop in a given situation[...] *In part*, not every mode of listening is in any immediate way adaptable to every type of sound structure of even to every type of musical work[...] *In part*, different modes of listening are in different ways more or less firmly connected to specific listening situations (Stockfelt 2004, p.89).

Could it be that when an active listening to sound-in-itself is called for, we can 'tune' our listening to reduce the influence of anything outside the sound? Reduced listening is used, for example, by record producers and engineers as a tool to get the sound they require. Producers will listen to the music differently than the average listener who is more interested in the artistic merits of the composition/song. Kim-Cohen argues that sound has the ability to say so much more than just itself. Looking to extrinsic factors can add much depth to our listening experience. This is why sampling in hip-hop, or in any other music, is so powerful and richly layered. It would seem to me, in concurrence with Stockfelt, that we will be better off if we can learn the importance of listening, and adapt our modes of listening in order to best fit the situation/music/sound at that time.

Chapter 2

Supporting Document to the Portfolio of Works Submitted

2.1 Overview

I like to create situations in which the listener can examine and enjoy a small set of exposed sounds and/or an exposed awareness of the practice of listening. My compositional method is based on limitations - limited instrumentation and a limited gestural musical language. Its essence is to find pleasure in simplicity. A typical small set of sounds is created through the repeated use of just one or two actions on one instrument or sound source. Often the set of sounds is examined by relating overlapping small variations in the set. I tend to favour variations that appear through the complexities of human performance and the idiosyncratic nature of certain instruments.

2.2 Listening

I believe that the type of music I compose can be intriguing because of its relation to the listening process. The music is in a constant state of flux, constantly generating variation. The way we hear and listen is, in my work, the same. The boundaries of the musical divergence are defined and tight, which enables the listener to hear something new and identify change easily within the musical texture. Although the music is, in a way, highly repetitive, the same thing does not exactly happen more than once. Therefore, the listener is constantly 'generating' the sound heard, whilst the music is constantly 'generating' its own variation through inexact repetition. There is then the possibility that the listener is no longer sure of who is creating the variation.

2.3 Use of one instrument

Generally, I work with one technique or action on one instrument. This is one method of removing the mystery, which in regards to the above mentioned sound-in-itself theory, would get in the way of the appreciation of the sounds. The title of each work states what instrument is being sampled[8]. There is no need to try to identify the source. I cannot control whether the listener sees the title or reads the description. However, I expect that due to the limited use of instrumentation, the curiosity in causality is also somewhat limited. Paradoxically, some of the techniques obscure the exact identification of a particular instrument. It is likely that my interest in electronic music influences what sounds I am attracted to using for my compositions. Nevertheless, I expect that the recognition of source type is for most listeners an easy process.

By one instrument I refer to the one unique instance of that instrument – 'many harps' are different to 'many of the same harp'. As my composition process is about layering instances of the same instrument, the use of one unique instrument creates a unique kind of homogeneity. I hope that the extreme homogeneity allows the listener to focus more on the details on the surface.

The strength of the work is the position it takes between the musical and non-musical. In the majority of my works musical instruments be they traditional or non-traditional, are used. As such, this imparts an inherent musicality to the pieces, due to their recognition as instruments, and their use of pitch. However, my compositional concern is not so much with musicality, but sound.

8 Sampling here refers to using recordings. In my case they are all original recordings.

As someone who works almost solely with the computer to create a compositional product in a fixed medium, the question arises ‘why choose to use acoustic instruments?'. The use of acoustic instruments in my composition stems from my experience as a performing musician - both in experimental art settings and commercial situations. The physicality of performing acoustic instruments is very important to my music. Through playing free improvised music for some time, I have developed a deep curiosity in exploring instruments often using extended techniques. As my music is about subtle changes, I enjoy how, with acoustic instruments, it is very difficult to do exactly the same thing twice. The techniques I choose to use involve an innate fragility, by which I mean this non-repeatability is exaggerated and brought to the fore. For example, *Harp Fan II* is created by using a hand held fan on a folk harp. The centre of the fan is used to ‘grind’ a string which excites it and makes the harmonics randomly fluctuate almost constantly. Variations are inherent.

2.4 Pitch

Pitches are used, but there is *never* a consideration of what pitches should be used. Pitch is still important though. The choice of pitches is guided by the ear alone or left to chance - they are never considered in terms of functionality. I am interested in pitches only in so far as I want the listeners ears to be ‘caught’ by unusual harmonies, yet my compositional style is still based on an intuitional ear for what I consider to be beautiful.

Pitch choice can be governed and constrained by the instrument being used. ‘Ghost notes’[9] are used for the pieces that go by the same name. When I was performing these ghost notes I found that certain pitches were easier to perform than others (therefore

9 Creating 'ghost notes' is a jazz technique.

sounded better on the recording), thus this influenced the pitch material used in the pieces. Sometimes pitch choice can be completely free, as in *Melodica*. My approach to pitch shows my inclination to sound-in-itself, however, there is one piece that was born from extrinsic concerns; *Harmonica I*. The pitches/chords used are very noticeable for what they are, and they should - quite obviously - signify the very simple, basic technique of exhaling and inhaling on the first few notes of a harmonica; probably the first gesture anyone would perform on the instrument. This piece was a reaction against the very complex contemporary music that I was hearing a lot of at the time. I wanted to make a piece from an extremely simple, almost childlike gesture. For me, the piece was an exercise (if only for myself) in creating good music by very simple means. Hopefully, as the piece is played, the location of the piece and the listener's attention gradually moves towards sound-in-itself. As discussed in the commentary, extreme repetition allows the listener to be less interested in the cause, and more interested in the sound. Also, as more slightly detuned harmonicas enter, the pitch relationships become more complex and the recognition of individual chords is lost in the 'cloud' of pitches.

2.5 Process

As the musical sounds and gestures I favour are often 'minimal' and are often overlayed to create multiple instances of one layer, so concepts of form and structure are also reconsidered in my work. I utilise a compositional process that puts sound in a time frame, which does not involve me specifically placing one sound (or detail) next to/with another. Process is one way I achieve this, the outcomes of which are in some way indeterminate. The computer is used to realise these processes. The details within the

overall sound are what I am most interested in. I aim to compose in a way that does not control the details and allows the listener to focus on them.

2.6 Duration

Most of my work is drone based, or at least minimally articulated drone-like sonic material. However, unlike many composers working with drones I do not feel the need to employ long durations. When I feel like a piece has achieved what I want then it is finished. So far I feel that I have not come across an idea that has demanded an extremely long duration. Having said this, duration is important, and the points below help to explain why (even though I am not against it) I do not tend to write with long durations.

- A fleeting moment: the shortest pieces in the portfolio represent my desire to write pieces that exists as a kind of fleeting moment. The piece is gone before you have time to think about it too much. I like the idea that the piece could continue as a hazy memory in the listener's head.
- My work does not try to communicate ideas. I do not require the listener to try to understand what is happening in a piece. I would like the compositions to exist (be perceived) as a single form. The listener knows that little will change, so this shifts the focus on to the changing details on the piece. I feel that in long durations perhaps the listener will start to think more about structure and the concept of the work, something I am not so much interested in.
- Influence from electronic music: Typically drone works from electronic artists are

less extreme than in the classical avant-garde. Often such works are between 6 - 15 minutes in duration. This is probably due to the fact that many contemporary electronic composers, developed from pop and the avant-garde, and tend to work in/with albums. Each track on average may be shorter, but the composers expect albums to be listened to in their entirety. This is how I see my work being received.

2.7 Processing

With the majority of the portfolio I have kept processing to a minimum (with exceptions on Disk II). As I am predominantly working with acoustic instruments, I find that the sound I get from them is enough. I do not feel the need to change them/make them more 'interesting' through processing. I want to expose the naturally occurring phenomena and let them evolve/change organically. As someone who used to write very processed music (and occasionally I still do) I found myself recognising certain types of processing in other people's work and to me, this became distracting - I was struggling to listen to the music without deconstructing it, identifying the processing involved – the notion of a 'technological listening' as proposed by Denis Smalley. Here there is a different kind of causal listening than discussed in the commentary, but the idea is the same. It was my feeling at the time of writing these 'acoustic' pieces that the listener would have a more direct appreciation of the sounds if there was no processing obscuring them, again promoting a sound-in-itself approach.

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