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Negotiating sound, noise and silence through improvisation, composition and image

Stephen Harvey

A thesis submitted to the University of Huddersfield in partial fulfilment of the requirements for the degree of MA by research

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Abstract

I propose the panoramic, but there is always detail in the terrain. My music resembles a topographic vista that is long and wide, but this should not infer stasis. On a macro level I aim for the sonic as landscape, containing intricacy and particularity, proposing an aura of curiosity, delight, fascination and occasionally antipathy and shock. I desire conflict, friction and incongruity in music—broken detail, fractured sound, noise, silence, ugliness, flexibility and constraint, violence and beauty—sometimes as a device to reveal or mask and at other moments to highlight subtleties that might otherwise go unobserved. It is the stuff that disrupts, interferes or disturbs on which I fix my gaze. Equally it is the influence of gaps, spaces and silences between the details that can often generate the most fascinating results. By layering seemingly incongruous material one can alter the way it is formed, creating interesting gestural quirks and intriguing inconsistency. Seemingly incongruent noises are 'collided' as if in a car crash, creating new shapes, crumpled and disfigured, that emerge from the once rigid surface of the vehicle's steel body.

It is with these methods in mind that I formalise the ideas behind much of what I do, particularly in reference to the *Collided Voices* project. Through *Collided Voices* I explore a notion where melody, in the form of medieval vocal music, is both resistant to destruction and is able to co-exist with noise, harmoniously. Contextualizing the work within the realm of improvisation, art music, studio composition, noise, pop and electronica, my work references much that has gone before. However, these approaches to negotiation, exploration and intertextualisation function as a personal filter through which unusual and unique combinations of elements are revealed within the musical frame.

Acknowledgements

I would like to thank Aaron Cassidy for all the help and guidance during this research project. I would also like to thank Tracey Panayiotou for her unerring support, without which this would never have been possible. Also thanks to my mother Heather and my father Kenneth for having never doubted that I could do this. To everyone in my family who gave me support, you know who you are, thank you.

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Word count excluding references 10240

Conclusion – What next?

References

i. Portfolio submission contents

CollidedVoices:

CD album of 5 five pieces with a total length of approximately 35 minutes, mounted in hand made cover with insert.

CollidedVoices – Crush: Composition with electronics

Live performance of composition with electronics based on the CollidedVoices project

Live audio of performance as part of the re:sound events in Phipps Hall

Video of studio performance filmed in the main studio at The University of Huddersfield

Incessantly:

Composition made for the Distractfold Ensemble

Score and workshop recording

an infinity of bliss in a moment of time:

Composition made for Jean-François Laporte

Score and video of solo performance at The University of Huddersfield, Phipps Hall

Audio recording of performance at the Conservatorio Giuseppe Verdi, Torino, Italy.

Shackle workshop/rehearsal:

Collaborative Improvisation

Recordings of workshop group improvisation

Street Machines EP:

On-going project comprising composition/street recording of working machinery.

Audio of four pieces:

Duet for Hedge Trimmers

Duet for Chain Saws

Solo for Mechanical Plate Compactor

Super Silent - Industrial Water Pump

Image scores:

Ongoing composition project to incorporate/combine text and image

Hard printed copies and PDF book versions submitted

tone no tone

blur / decay

 $Ode\ I$

Divergence

Resistance isn't Futile

Ode II

Inbetween States

1. Introduction

Music, the word we use in our everyday language, is nothing less than the picture of our Beloved. It is because music is the picture of our Beloved that we love music.

HAZRAT INAYAT KHAN

My work is making music; it is also my pleasure. As an improvising performer, a composer of both notated works for others to perform and studio based fixed media pieces, I am committed to the creation of music. Although currently I am primarily occupied in music as a creative process, I am also a photographer and designer, employed over the last twenty years as a graphic artist working within the sign industry creating practical wayfinding, signage and branding solutions and periodically receiving assignments as an architectural photographer. Having spent much of my time engaged with the visual, it is perhaps not surprising that the plastic arts, in the broadest sense of the term, should have had such a determining role to play in my current activities.

The exploration and negotiation of sound, noise and silence embodies most of my working practice as a performer and composer, with my particular interest residing within the detail of these diverse concepts. I am fascinated by the layering of seemingly incongruous material in the 'combines' of Robert Rauschenberg, the painful/beautiful physical painterly abstractions of Francis Bacon, the sonic majesty that is inferred by the work of Mark Rothko and the considered visual cacophony that is the work of Jackson Pollack. My own musical composition combines similar techniques, layering of sound for example or the juxtaposition of sonic colours and textures. By suggesting beauty and disorder, opacity, transparency and obfuscation, clarity and ambiguity collide to propose new

emergent forms. As I compose, these somewhat contrary elements become familiar, forming both the substance and the essence of the work.

In this document I discuss various methodological devices that I apply to both composition and improvisation. I examine the processes associated with my working methods, particularly the notions of exploration and negotiation. I discuss how and why I embed found material in my work, through both sampling and original field recording. I reflect on the consequences this found material can have on my compositions, through direct inclusion in the finished piece, as an influence to further examine or process that material or even as a determining factor in the production of additional material.

I consider how the impression of perspective and the construction of form appear in the work, with reference to a particular kind of landscape, one that is not only wide but also broken by detail. In the wider context, I contend that it is the micro-detail that impacts on the way 'scape' might be contemplated. I touch on how this approach is apparent in much of what I practice and look to locate an aggregation of defining characteristics that describe the 'body of work'.

I describe a range of interrelating processes that form the basis of my working practice and workplace methodologies, not least the apparent dichotomy of studio composition and improvisation. Also, I talk about the use, and occasional abuse, of post-production techniques when manipulating materials through software and hardware filters and processors, highlighting when and how these strategies have been rewarding and when the experience has been less productive.

I specifically consider the aims and working methods of the *Collided Voices* project, describing the concepts behind the work and how the project can be framed within a wider context. I detail the working arrangements regarding improvising for studio composition and how this process can be valuable in realising ideas. Since much of my music could be described as giving primacy to texture

and timbre rather than being dominated by pitch and harmony, I briefly consider the effect this might have on the perception of the work and how this might correlate within a contextual discussion of a noise/music continuum.

My notated compositional practice employs open, flexible and rigid instruction through text, graphics and photographic images as well as traditionally accepted varieties of score notation. I discuss why I have chosen to present my work in this way and why I believe this particular version of collision is such an important line of enquiry.

Finally, I look at supplementary projects both completed and ongoing and look at how they further inform my overall practice.

2. Three approaches to composition - Improvisation, fixed media and notation

Experimenting with addition and subtraction can be a powerful method of manipulating the given within a newly created synthetic sound world where ambience and atmosphere can be reshaped or transformed. Michael Pisaro observes that

A composer is somebody who changes the sonic situation. I see composition as basically just a change ... 'cause we have to admit that sound is going on all the time and we live in an orchestral environment if we take time to hear everything ... (Pisaro)

Sound, noise and silence affect our sonic perception; indeed all our senses are in play and as composers we need to be able to tap into and take advantage of that 'sonic situation'. Personally, the activities in which I am predominantly engaged are fixed media studio composition, improvisation and creating notated works for others to perform and I view them as concomitant. The methods and processes connected with these activities appear, on the surface, to differ radically. After all, improvised performance should be heard and experienced instantaneously, the sounds and gestures ephemeral and impermanent. Fixed media pieces, on the other hand, are intended as repeatable experiences. Notated composition, by its very nature, requires time and consideration to be adequately constructed and observed. How, as an improvising performer and studio composer, can one square the process of studio composition, the endless perfecting of material, with the ultimately imperfect nature of improvisation? In the studio I primarily concern myself with "the exploration of the back-and-forth process between improvisational performance on one hand, and its editing and further transformation as a studio composer on the other" (Tremblay, p.3). Unstructured processes can influence and sometimes determine the often highly structured practice of both studio and notated composition.

In negotiating sound, noise and silence, I conjure up a scene where these three separate; clearly

defined (or hazy and ambiguous) materials can be moulded, fashioned and assembled into a composed musical work. Live improvisation is still very much part of what I appreciate most, but it can be seen as an entirely separate approach to the improvisation work I do as part of my studio practice. Ideas that are formed whilst improvising and work done whilst playing the studio inevitably inform the notated works, and then as these ideas begin to flourish one cultivates thoughts on how to proceed in other unconnected works. The process of working and influencing becomes cyclical, constantly throwing up interesting new avenues of enquiry.

2.1 Improvisation in practice.

My improvisational practice stems in large part from my participation with the Edges Ensemble, an experimental collective led by Dr Philip Thomas. His enthusiasm for experimental and improvisational practice changed the way I thought about music and influenced me to explore a very different avenue to the one I had envisaged when I returned to performing. I have played the guitar for many years, mostly as a tool for writing songs, but I have also played in group situations as a member of a few rock bands. It is an instrument I know well, affording me the opportunity to explore unconventional ways of producing material, including a range of effects pedals and MAX patches. Christian Fennesz, Ben Frost and in particular Stian Westerhus are the primary influences on my playing. It was a performance that Westerhus recorded for BBC Radio Three! a few years ago that set me on this particular course. It was visceral, noisy, gorgeous, unpleasant and completely mesmerizing. Texture and timbre are primary in his palette, although often this noise is punctuated with sonorous melodic material where highly amplified strings are bowed and filtered through looping effects, delays and reverberation units. This material is then offset against bit-crushed and distorted glitches and crackles.

¹ Stian Westerhus video - https://www.youtube.com/watch?v=fm5a9t8PcdU

This year my practice as an improviser has been grounded in the use of the pedal board as an integral part of the instrument. The guitar and the effects are now a single entity. I was, however, beginning to find the set-up restrictive, cumbersome and disconnected from the audience as I was spending much of the time on the floor out of view. Raising the pedal board off the floor and having it where the controls are accessible means I can change parameters quickly and with ease in order to manipulate the sounds instinctively and spontaneously.

Part of the continuous process of proficiency and development "relies on the player's ability to develop his music, to maintain its evolution, and so guarantee his own continuing involvement" (Bailey, p.112). Finding creative partners with whom to improvise is more difficult than one would imagine. I talk later in chapter 4.5 about the Shackle workshop that offered new constructive methods of working on group improvisations which effectively tackled ways to overcome the problem of ego and personality differences within the performance environment. Since "the possible musical dimensions of group playing far outstrip those of solo playing" (Bailey, p.112), being part of a musical relationship where issues of ego and disharmony are less apparent and where the childlike joy of 'just making music' dominates, resulting in a more fulfilling experience. I have been working in such a situation with the musician and composer Dominic Thibault as 'Tout Croche' for three years now. I was interested to hear how Dominic's experience of playing in 'Tout Croche' had particularly affected his ideas on improvisation. Below are his responses to my questions:

1. Do you think there is anything particularly unique about our approach to improvisation, if so how does it inform your playing within the group environment? "Tout Croche offers a true exploratory approach to improvisation,

searching for music inside of noise. Built on friendship, the project provides a stimulating environment for improvisation characterized by listening, confrontation, complementarity and accompaniment. As our musical output proves, our interest in sound is often different but complementary (probably because of our very different musical backgrounds). The way I see it, I have a tendency to resort to more harmonic sounds while Stephen is, to me, the

- noisy one. What makes Tout Croche so singular is the time and energy that we have agreed on to feed into the project in order to reconcile our distinct musical universes to make a common music."
- 2. Does playing with the group influence any part of your own individual practice? "Absolutely, yes! I'm a better musician because I have learned to participate in a collaborative creative process. Musical freedom, spontaneity and embodied performance are experiences that are particularly difficult to achieve in the solitary work of the studio. Tout Croche helped me discover this intensity and passion required to fulfil the wildest musical ideas."

The experience of this group dynamic is in large part why I introduced the notion of the 'invented' partner, which goes some way to replicating the "more exciting, the more magical side, which can only be discovered by people playing together" (Bailey, p.112). In my experience, musical partnerships can often be dissatisfying; indeed budding friendships have been curtailed due to 'musical differences'. Not withstanding a shared interest in the sonic environment, there are two elements that make playing with a partner successful: first, complete trust in the integrity of the person with whom you are playing, and second, a stubborn commitment to the worth of the project. The material being produced can inspire new directions and new ideas, and the resistance that another player offers forces different perspectives on the musical decisions being made at any given moment. Restraint, obstruction and moderation can be incorporated into the playing practice and they become the guiding agency during the performance. The process involves an oscillation between fluidity and instability, between freedom and restriction, and while this can happen as a solo performer, the frisson that a partner can add is not to be underestimated. I agree with Dominic's second point completely: working in collaboration that works can take you to unforeseen places and can reinforce a belief in one's own ability as a performer.

2.2 Fixed media composition

Whilst improvisation dominates my practice in live performance, I have also found that by integrating this technique into my studio practice I can generate both complementary and contrapuntal material. In working with sound material directly in this way a basic idea or structure of a composition can, at least to some degree, be defined. There is no intention of the result being consumed as raw, improvised material. In fact quite the opposite, it will go toward forming the basis of the finished studio compositions. It is the 'back and forth' nature of the process mentioned earlier and the perceptible quality of 'liveness' in the material that I find so appealing. Defining 'a quality of liveness' is all but impossible—Imperfect? Unexpected? Spontaneous? Without premeditation? "Essentially, music is fleeting; its reality in the moment of performance. There might be documents that relate to that performance – score, recording, echo, memory – but only to anticipate it or recall it" (Bailey, p.142). When Steve Lacy was asked to describe the difference between composition and improvisation in fifteen seconds he replied,

In fifteen seconds the difference between composition and improvisation is that in composition you have all the time you want to decide what to say in fifteen seconds, while in improvisation you have fifteen seconds. (Bailey, p.141)

Retaining this ephemeral quality as I compose, filter, manipulate and rework the sonic material on the timeline is of primary importance, even if, as is often the case, only a remnant of the original is discernable.

Solo improvisation without doubt does have its limitations. There is a tendency to become dependent on familiar techniques, tricks or 'go to' chops. Developing strategies to promote alternative behaviour during performance contributes much to my practice as a whole. One particular method that has proved to be successful as part of what I shall refer to as 'studio improvisation' has been the idea of working with imagined collaborators. Although this method will

be discussed in greater detail later it is pertinent to touch on it here. Conventionally during performance, response to gestures made by other performers becomes an important foil against which one can work and respond. Without this resistance players rely on their own gestures for guidance and structure. This in itself is not necessarily problematic but it can be restrictive. A solution is to imagine a collaborator, introduce an element that offers resistance to the practice. Where actual performers can be inspirational, imagined or invented collaborators in the form of samples or computer algorithms such as a MAX patch can do a very reasonable job of stand-in replacements, facilitating the improvisatory process and allowing a more naturally conducive setting and ultimately a more compelling and fruitful outcome. Although one recognizes that an audio sample or MAX patch can not offer the same experience as a live partner, unfamiliarity with the sample or randomness in the algorithm can keep the quality of the performance fresh and interesting. The approach outlined thus far is embodied in the production of *Collided Voices*, and there is further analysis of this strategy in chapter 3, where I examine this particular work in greater detail.

2.3 Notation for others

Notated composition for others to perform is a relatively recent consideration for me, though not altogether unconnected with my other activities. As a way of realizing ideas outside of my own preconceptions and exploring the collaborative process in ways that would otherwise be impossible, this form of composition can be a rich source of musical endeavour. My work can loosely be described as 'indeterminate', where "the composer deliberately relinquishes control of any elements of the composition" (Bailey, p.60). However, I include restrictions and rigidity within the flexible form.

Extracting sounds, connecting timbres, making structures, and exploring ways that blend musical ideas from different perspectives can be achieved through collaborative composition. I envisage an artistic relationship between composer and performer that is similar to the association between improvising musicians, where a partnership of ideas, skills, and abilities acknowledges an interactive state of creation. To engineer this approach requires not only compromise, as might be imagined, but also that the participants consent to the openness of the process. I discuss in greater detail the procedure involved in relation to specific compositions in chapter four.

3. CollidedVoices

Simple melody enthrals me. The beautiful refrain, an extraordinary chorus, the musical 'hook' that stays with you long after the package that contains it has gone, particularly when that melody is not immediate, when it is hard to hear or difficult to find. Imagine the clanging noise or the whirring of a machine, repeating over and over which morphs into a melody over time. Similarly obfuscated by the noise of scraped guitars, cacophonous feedback and thunderously distorted drums are the barely audible, fragile and indistinct melodies that constitute the songs of artists such as The Velvet Underground or The Jesus and Mary Chain. However,

What we call noise is merely a different kind of harmony, and the celebration of it in post-Velvet Underground guitar culture is a celebration of harmony. That's why it feels so good: it's the raw power of vibrations.... When it's at its most satisfying, noise, like pop, embodies the laws of harmony and universal sound. (Boon, p.68)

So, both as an improvising performer and a composer I aim to combine within the structure of the musical frame elements of tonality and consonance with dissonance, atonality and noise; the beautiful and the dreadful.

It is within this hybrid language of tonality and noise that something fascinating happens. "Noise and beauty might initially seem like opposites," says Joanna Demers in *Listening through the Noise*, "but in combination, they dismantle the musical frame that used to maintain a healthy distance between the artwork and the outside world" (Demers, p.104). It is as if the stuff of real life is being allowed to intrude into this somewhat pristine, rarefied world of 'beautiful' music. One might imagine that noise in music would resist established perceptions of beauty but, as Demers suggests, "...this resistance is an ambivalent gesture, for the very act of thwarting beauty by creating ugliness in fact reinforces the idea of beauty" (Demers, p.102). There is much to discuss here, although it is perhaps beyond the scope of this commentary. I believe there is something fundamentally interesting in this

notion of juxtaposition or combination and I think that noise can alter the way we perceive music, the way it can affect our listening behaviour and ultimately our reading of that music. As the German composer Diemo Schwärz notes in *Noise in and as Music*, "Using noise as music prompts a form of active listening. In contrast to sound with a definite pitch, noise encompasses many frequencies more or less equally. This allows the listener to hear the song in many different ways" (Cassidy and Einbond, p. 189).

The initial ideas for *Collided Voices* involved melody and noise, and early thoughts had centred on the use of folk music as melodic material. I still believe this would have some value, but I imagined a more incongruous juxtaposition. Whilst researching different styles of vocal performance for the project, I discovered a recording by the vocal group Sequentia. The album was a recording of the *Canticles of Ecstasy*, written in the 12th century by Hildegard von Bingen. The first piece on the album, *O vis aeternitatis*, is a single line vocal melody accompanied by a bowed string drone throughout. What struck me was the way that the stripped down vocal was evocative of both strength and fragility. It contained an essence of purity, which, devoid of an earthly ego, is ingrained into our perception of beauty. I was immediately minded to make comparisons with the vocalist Elizabeth Fraser, whose work with the Cocteau Twins contains some of the qualities demonstrated here. One would have imagined that the noise element in the music of the Cocteau Twins would destroy the beauty of the melody; conversely it seems to enhance it.

3.1 Aims

Collided Voices is a composition that embodies both a sense of the expected and the incongruous. It is this duality of extremes that I find so richly rewarding, inspiring and mentally stimulating; but is also extraordinarily ephemeral, difficult to define and challenging to achieve. The aim is to create a work that integrates this duality within my practice as an improviser working within the broad,

imprecise, nebulous genre of 'noise music', and as a studio composer manipulating detailed sonic materials and arranging them on a timeline in a Digital Audio Workstation (DAW).

Contextually, *CollidedVoices* is partially rooted in the work of the British rock bands My Bloody Valentine, Cocteau Twins, The Jesus and Mary Chain and the guitar noise pop drone pioneers The Velvet Underground. The defining musical similarities are simple, tonally focused melody and noise. Broadly, this music could be described as pop, although it was never my intention for *CollidedVoices* to be considered as such, especially if one reflects on the context of medieval liturgical vocal music or indeed noise; it does not appear appropriate. Neither is it a characteristic of my improvisational practice; perhaps the absence of any obvious rhythmic element locates it elsewhere. It is, however, surprising how often melodic phrases that appear in medieval liturgical vocal music are reminiscent of beautifully crafted pop songs. As the recent popularity of recordings by Sequentia, the Tallis Scholars and The Sixteen confirm, these tunes, like all great pop melodies, continue to resonate beyond their time.

It is quite feasible that, as Christian Fennesz's 'reworking' of the Beach Boys for his album *Endless Summer* demonstrates, great melody resists destruction and it is this notion that is central to the thinking behind *CollidedVoices*.

3.2 Working Methods

Back and forth flows the dialogue of imagination and discipline, passion and precision. We harmonise groundedness in daily practice with spiritedness in daily stepping out into the unknown. (Nachmanovitch. p.171)

Once the decision was made that medieval vocal music was to be a main component of the

Collided Voices project, I was faced with a decision. Would there be the time and resources to record the vocal pieces anew or would a credible option be to use found examples of the work? I still wrestle with this dilemma but there was little real choice, and so much of the initial research for the project went into sourcing workable available material. Much like a crate-digger searching for the perfect break I spent some time auditioning recorded vocal music, particularly of the early medieval period. As I explored the differing styles it became clear that the melodic structure of the sampled material needed to be uncomplicated; multiple voices were fine, as was simple harmony, but complex arrangements when coupled with the noise of the huge reverberant buildings became impenetrable and overpowering.

Early experimentation with the found material was open, flexible and somewhat indeterminate in approach. It was important at this early stage to be playful and unfettered by any particular reference as it may influence the formulation of any future compositional or structural ideas. This formative research was constructive and beneficial and there appeared to be value and desirability in the emerging chaotic bricolage.

With a shortlist of around ten pieces that contained the requisite elements for the project there began a process of recording improvised performances that would occasionally incorporate the samples as 'imagined' performers, either with the full guitar rig or with smaller collections of sounding implements. Also, since so much of the material produced through improvisation is clearly associated with the very particular soundworld of the guitar pedals it seemed pertinent to pass some of the actual vocal samples through the effect rig. Filtering the vocal material with harmonising effects, distortion, flanging and chorus generated new material imbued with an alternative identity that could be assimilated into the guitar sound world. The 'organ sound' at the start of the second section is a good example: filtering a voice sample with the 'The Hog' harmoniser pedal² and then passing through some distortion has softened the consonants, altering the timbre and leaving just a

² Details of the pedal can be found here: http://www.ehx.com/products/hog

fragment of the original melody. This is then delayed and repeated, creating a swirling mass of sound. During this process it became apparent that much of the melodic material offered some 'resistance to destruction', and by exercising restraint over the operation much of the original qualities of the samples were retained or at least recognisable.

Manipulating sections of the improvised material and many of the vocal samples with audio filtering software—including Cecilia, Soundhack, Argeiphontes Lyre and Melodyne—completely altered the sonic qualities. Textures were bit-crushed, pitches shifted, harmonies completely removed, the audio modified in a range between slightly altered and unrecognisably mutated. In the final section of Collided Voices this is quite clearly demonstrated as the voice samples here have been manipulated quite considerably in Melodyne.³ The software is primarily used for correcting pitch in vocal performances, but one can also remove individual notes and alter the formants of the voice, creating a completely different performance. I have intentionally been quite heavy handed with the editing process, causing the voice to break apart and introducing an aesthetic of digital failure or glitch. It is interesting how often the sound of glitch, failure and breaking can sound so beautiful, as exemplified in the music of Alva Noto and Ryuichi Sakamoto.

There are many types of digital "failure." Sometimes, it results in horrible noise, while other times it can produce wondrous tapestries of sound. (To more adventurous ears, these are quite often the same.) (Cascone, p.393)

Clearly there should be purpose in this malfunction or reappropriation, and "the negotiation of failure occurs in the listening, the playing out of sounds in time" (Hegarty, p.190). To my ears this misuse of software results in a voice that sounds fragile, alone, torn apart by melancholy. The tone of the piece is like a 'broken' requiem, a combination of solemnity and faded beauty, where only fragments of possibility remain.

³ Details of the Melodyne software package can be found here: http://www.celemony.com/en/melodyne/what-ismelodyne

3.3 Details

Once I had gathered sufficient material with which to commence initial studio exploration I became conscious of the need for some thematic form or frame to work within. Although the process up to this point had intentionally been open and fluid, it now required control; there was a need to restrict and regulate the process. When to apply the compositional brakes is a significant component of the overall procedure, often as much through intuition as it is consideration. How this works in practice is difficult to discern but one instinctively knows when something is wrong (or right) without the need for conscious analysis. Is this an inherent ability or a learnt skill? Clearly, this is an oversimplification of a complex process but I believe that something akin to this happens in microseconds, back and forth between the conscious consideration based on training and regular practice and the intuitive process informed by instinct, knowledge and unconscious skill.

Early on I made what I now consider to be three important and inter-related decisions. First, the final piece should comprise a number of separate sections creating an over-arching narrative cohesion. Second, any single section should only include one main found vocal sample. It was apparent that combining any more than one main vocal sample with the guitar improvisations would be chaotic and messy, in a detrimental way. And third, the piece should be no longer than 35 minutes. A time constraint on the total length allowed for some freedom within the individual sections to explore duration in a constructive way.

Having determined an overall structure, one can turn to the details—colour, texture, density, layering of material, juxtaposition and movement—resolving to control the flow of material or to allow it some freedom. Editing decisions, about when to cut or fade and when to let material be open. Deciding when to embrace clarity and when to utilise opacity or masking to create depth and

mystery. These are all procedures that can resemble the improvisatory process that occurred when generating the cache of material; there are moments when one intuits the decisions and others when consideration is required. When the editing process is in full swing and one is using the studio as "an instrument to experiment... before deciding what to use from this experience to compose" (Tremblay, p.4), there can be moments when one senses that some vital ingredient is lacking and a decision needs to be made about whether to return to recording, or whether something can be achieved with the material that is already available. An obvious example would be the lack of material available in the lower frequencies due to the instrumentation: the guitar is perfect for the middle/high register (between 240 Hz and 2.5KHz) but not so useful for producing anything below about 100Hz, a place normally occupied, in a rock band at least, by the bass guitar. In this instance, when there is a requirement for material specifically designed for a particular gesture or section for it to make sense, three options were considered:

- Overdubbing within the composition: playing and recording new material whilst the material is played back, a process used extensively within pop music production.
- Create new material that could be incorporated: one might set up a studio session knowing
 the kind of material that is required and recording a body of that class of material for later
 use.
- Manipulate existing material: if one has material with the right textural quality the audio can be manipulated, filtered or pitch shifted to cover the required lower frequency range and then layered with other material to achieve density.

It seems obvious that one should use the studio to complement the improvisational process rather than stifle it and embracing the process of recording sessions that are "later edited, then reperformed, overdubbed or re-arranged, then re-edited" (Tremblay, p. 6) would seem to offer the best of every world. In my experience, however, caution is required when carrying out these tasks. There are times when one is faced with a particularly dissonant phrase or unexpected glitch that, on some days, would seem to be unacceptable or inappropriate. The overwhelming urge is to remove it or smooth off the edges and of course with the ability to infinitely edit the audio this is very possible.

Through homogenization the work becomes far less powerful and it isn't until later that you realize, that along with the dissonance, the spark that made it compelling has also been edited out of the piece.

There is a real sense that the compositional process in the studio is one of construction, building a sonic experience. There is a sense of emergence in progress, of being both architect and builder working concurrently to create the whole. Sketching ideas out in the DAW, rubbing out, moving, layering and replacing materials, occasionally through trial (and error) but also intuitively knowing clearly what was required. A particular area that called for serious consideration related to the transitions between the end of one section and the beginning of the other through the five separate sections. There appeared to be a clearly defined thematic structure within each piece, however it was important that continuity between sections should flow without hindrance or unintended conflict. I felt that there could have been a danger of the transitions appearing either contrived or meaningless or worse still that it be conceived as a 35-minute drone. It is important that although the sections have a recognisable sense of individual character, and that they could stand alone as being self-contained, the piece is meant to be heard in it's entirety. Each section is arranged to provide some contrast to the next and it is expected that the listener participate in a single, uninterrupted journey through the whole piece.

4. Works for others

My recent notated work is rooted in the flux afforded by the dichotomy between flexibility and constraint, rigidity and openness. In this chapter I discuss a series of compositions made for others to perform. I will also look at alternative devices including text, graphics and photographs that I use as a means of creating dialogue between the composer and musician and talk about methods of achieving a workable score.

4.1 Notated

An issue for consideration when devising these compositions was the level of flexibility within the instructions. One model might incorporate flexibility within the 'rigid' composition and a second instigates a procedure that actively embraces the notion of the 'collaborative workshop', where ideas and processes are exchanged and explored through a series of 'back and forth' events. I was encouraged to use the latter method when writing compositions for the Edges Ensemble. Pieces were realised and discussed, ideas manipulated and improved and considerations regarding dynamics, for example, or arrangement could be acted upon immediately. A recent instance of a piece that predominantly relies on the collaborative workshop technique is 'an infinity of bliss in a moment of time', the piece I made for Jean-François Laporte, which I discuss in greater detail below.

Performance flexibility operates in the space between compositional rigidity and complete freedom or openness. In fact, it can often work in opposition to or in tandem with both of these extremes.

4.1.1 Distractfold Ensemble - Incessantly

Incessantly is a piece I composed for clarinet, cello and drums to be performed by three members of the Distractfold Ensemble. It is a composition that features the open/flexible/rigid form that has recently become more prevalent in my work. The original score (see Fig 1), consisting of tablature, text and traditional notation, indicates to the players what to play and to a certain degree when to play it, but outside of those parameters many of the decisions are flexible.

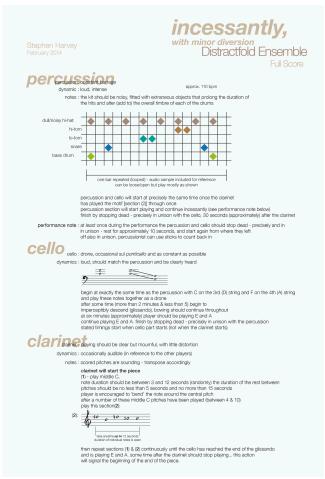


Fig. 1 Original working score

The drum and cello parts are rigid, however they are instructed to coordinate their stop and start points throughout the piece. Also some autonomy is accorded to the cello in regard to the timing of the glissando event. The clarinet part consists of two distinct sections that are rigid in terms of

notation and dynamics. There is, however, no instruction as to the duration of any note or to the structure of either of the sections. Performers can also manipulate their parts in relation to each other, a process more akin to improvisation. I also became interested in producing an alternative version (Fig. 2) of the score to see if it had any effect on the way it would be played and received. Since this happened subsequent to the workshop I have not had the chance to have any feedback from the ensemble. There are some amendments to the drum part, which allow for some alternate patterns to be played.

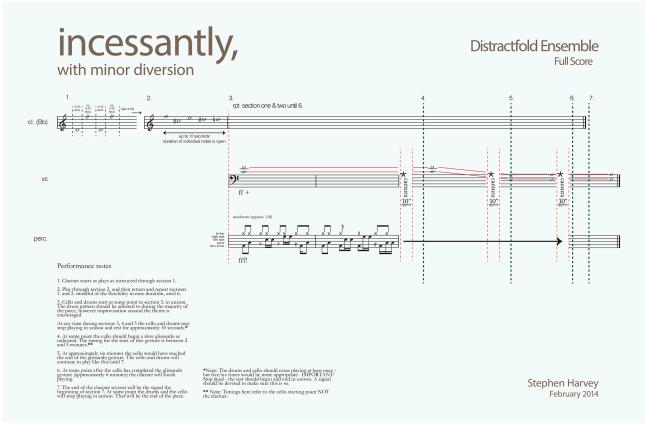


Fig. 2 Alternative version of Incessantly.

The piece aims to articulate notions of conflict, where friction and hostility are pitched against despair and grief. The drums and cello are locked together throughout to produce a cacophonous noise where the cello is practically indiscernible. The physical intensity required of the cello player is immense as she struggles to be heard, despite the obvious futility of her endeavour. The melancholic voice of the clarinet is a constant presence throughout, however only becomes audible when there is a cessation of hostilities between the drums and cello. The tension is offset, perhaps intensified, by

the melancholy of the simple, childlike refrain played by the clarinet. One is also aware of how fragile the encounter is; the fact that this whole thing could break apart at any time enhanced the sensation of effort and liveness in the moment of performance.

4.1.2 Jean-François Laporte – an infinity of bliss in a moment of time

The 'babel table' (Fig. 3) developed and constructed by Jean-François Laporte is an instrument consisting of a number of tubes, membranes and valves driven by compressed air. The performer controls the air pressure with the tap-like valves: unscrewing the valve allows the air to pass through the membranes and vice versa. Forcing the air past the membrane in this way causes it to vibrate,



Fig. 3 Jean François Laporte and the 'Babel Table'. Photograph: Stephen Harvey 2014

thus producing a pitched tone. 'Bending' the membranes allows some control of that pitch. Open valves (those with no membranes) create a white noise effect, which can be filtered by allowing the

air to pass through and around the performer's hands. One can set up some specific sounds by adjusting a complex arrangement of membranes and straps. These range from high pitched screeching and gentle popping to cicada-like insect sounds.

The 'babel table' is inherently a temperamental instrument that requires skilful manipulation of its components to render any meaningful sound. Initially, I was inclined to compose a piece that required Jean-François to respond to an open set of instructions, ostensibly asking him to improvise around a set of text based 'poetic situations' (Fig. 4). I took as a starting point for the work the



Fig. 4 Original score for an infinity of bliss in a moment of time

soundworld of the 'babel table' and an image of a city landscape. A striking feature of the table is the production of pure (ish) sustained tones. To create contrast to this distinctive sound I devised a beat-driven fixed tape soundtrack that functions both as counterpoint to the drone and as resistance to negotiation by the musician. By siting this beat within the generic rhythmic parameters of Techno, i.e. 130bpm and straight four timing, it locates the work loosely within the form of music contentiously known as IDM (Intelligent Dance Music).

The finished score was presented to Jean-François for his consideration and comments. Through our discussions it became apparent that the idea of the 'open' text element proved to be incompatible with his working practice and he asked if I would revisit the composition and provide a score that was less flexible. Where I had imagined that the poetic text and clear rhythmic structure would offer enough resistance, he felt that it was too open, too comfortable. Part of having a composer produce a new piece of music, he said, was that he would be asked to explore new, unusual or uncomfortable places. Whilst the fundamental aesthetic principles of the score would remain the text treatment required some modification.

I had always envisaged that the piece would evoke an urbanscape, where noise, density, dissonance and chaos coalesce in kind of perverse beauty. To realise this aesthetic in a meaningful way for Jean-François I had to develop a greater understanding of the instrument, to discover its potential and exploit the possibilities in line with the aesthetic aims. Jean-François was both open and receptive, guiding me through my experimentation with the machine. A sound that features predominantly in the final piece is the loud cicada-like noise. This arose during our experimentation sessions and required much adjustment of the valves and membranes to achieve. I had also envisaged the sound of a siren that could be emblematic of a hectic metropolis, which required modification in the form of an additional valve. It was through such experimentation that I was able to hone my understanding of the 'babel table', to realise a potential of the instrument that previously may well have been missing, and revise my score in a meaningful way.

Once I had gathered some rough ideas and notes based on the work we had been through I produced a provisional document from which Jean-François was able to work. There was a distinct transition from experimentation to rehearsal, where a process of fine-tuning eventually resulted in the creation of a finished score. Furthermore, since Jean-François often uses an iPad during performance, I suggested I make an edited 'prompt' version of the score that could be used

specifically on this device.

Whilst I regard an infinity of bliss in a moment of time as a triumph in terms of collaboration as compositional practice, the concept that informs the piece was already in place, inspired by the work of photographer Jason Hawkes, particularly the portfolio of images entitled London.⁴ The piece can be imagined as a single image (Fig. 5), a panoramic view of a familiar city at night. The composition acts as a kind of tableau vivant, the story of a moment caught in time where all things are possible. It explores these myriad possibilities through a narrative arc—morning to night for example—describing a moment and many moments at the same time, the life that is captured in the very brief moment of time depicted in the image, and an imagined story of what might be beyond the frame. The aim was to evoke both the aural and visual cacophony of the seemingly amorphous panoramic sprawl and the strange calming effect that a beautiful city can sometimes have on one's senses when viewing the whole whilst focusing on the detail.



Fig. 5 London at Night. Image copyright J. Hawkes. Source: jasonhawkes.com – Used with Permission - Jason Hawkes

⁴ Jason Hawke portfolio available at: http://www.jasonhawkes.com/London-/1/

4.2 Non-notated

Non-notated refers to music which is composed for improvised performance, where the performance process involves playing with a 'fixed' musical or rhythmic element. The fixed element can either be completely fixed or conversely can include some randomness in the algorithm. I have developed my practice in this area of composition motivated by my work on the *CollidedVoices* project and specifically the introduction of the 'imagined partner' to stimulate a controlled improvised performance. The element of randomness this provides offers some resistance and can take a performance out of the familiar and into uncharted places. The first realisation of this process in action is connected to the *CollidedVoices* project where I created the companion piece, *Crush*. This gave me the opportunity to experiment with the imagined collaborator within a live, performative environment.

4.2.1 Collided Voices — Crush

Crush was conceived after I was offered a chance to perform at re:sound 4, a concert series run by Monty Adkins and Ryoko Akama. At the time, I was recording material for the *Collided Voices* project and was curious about how I could incorporate the noise/voice aesthetic into a live performative setting. By utilizing the randomness that can be incorporated into the programming language MAX I realised a patch that replayed a vocal sample through a range of randomly controlled filters over a set duration, whilst being subjected to increasing levels of distortion and digital bit-crushing as the piece progressed. Throughout, I was able to concentrate on my playing with the guitar/pedal board

setup, improvising with the partially random nature of the vocal 'performance' inferred by the patch.

The staging for the performance of *Crush* was an important consideration in terms of sonic presentation. My aim was to provide an immersive sonic environment, reflecting something of the huge acoustic space that the cathedral breathes into the medieval vocal and influenced in large part by a particular event: just prior to this performance I had attended a Tim Hecker concert where he played organ and electronics through a quad speaker setup in a church in Manchester. Hecker played the space as much as he played in the space and achieved a sense that sound could be liquid, like a thick warm enveloping substance in which we were completely immersed. The effect he created was both emotionally powerful and enormously visceral, revealing sound waves as being physical but not at all unpleasant. It was with this experience in mind that I approached my own performance. The rig I used was a high quality quad system (Meyer tops and subs) along with a valve 'MatAmp' amplifier setup for the main guitar output, centre stage. The audio from the laptop went to the quad system whilst sending the guitar audio from two DI boxes to the front stereo pair of the quad setup reinforced the guitar amplification. The playing experience was incredible; I was able to feel the sound and engage with the physicality of the music. The high volume level had the effect of heightening an emotional state, where physical responses are as important as those that are sonically derived. It was as if the music was constructing a sonic architecture both tangible and solid, like an ethereal collaborator, a third voice in the performance with whom I could improvise.

4.3 Image scores

Unlike any other visual image, a photograph is not a rendering, an imitation or an interpretation of its subject, but actually a trace of it. No painting or drawing, however

Images have the power to suggest emotions that act as neurological prompts through consciousness, memory and experience. As part of my practice I have been occupied with an on-going composition project that combines photographic images and text for musical performance. This particular area of study and practice is in the early stages of development and I will confess that I am unable to draw any solid conclusions as to its efficacy. Since images have semantic value that can be universally interpreted in some way or another, could they be successfully realised as scores for musical interpretation? There are antecedents to this concept of images as musical score, for example the work of Jez Riley French⁵ and Fred Frith⁶. In 1999 Fred Frith released an album of structured improvisations based on his photographic scores entitled *Stone, Brick, Wood, Wire (Graphic Scores 1986-1996)* where the score provides a guiding influence on the playing of Frith and his collaborators. Both the Frith and the French scores satisfy similar roles in that they exist as guiding lights with which to navigate a musical performance. They offer little in the way of resistance. The score, in this case, can only ever function as a call to action; what that action should be is left entirely to the whims of the performer based on the image and their reading of that image.

In the context of magazine and print media the combination of imagery and text is an established convention. As readers of such texts we have become adept at decoding meaning. Similarly in fine art through the work of artists such as Richard Long, Hamish Fulton and Robert Rauschenberg, among many others, it is recognised that the combination of image and text communicates and/or suggests powerful ideas. Much has been discussed regarding the relationship of text and image, how one subverts or enhances the other, how juxtaposition confers new meaning or can alter the reading of either or both, how primacy is given or ignored from one to the other. Talk of codes and semantic influence, of meaning being inferred through cultural, sociological or historical

⁵ Book of scores by Jez Riley French can be found here: http://issuu.com/engravedglass/docs/photo scores?viewMode=magazine

⁶ Fred Frith scores can be found on his web site: http://www.fredfrith.com/scores.html

significance is clearly apparent within certain circles; indeed academia incorporates individual studies around language, signs, symbols and signifiers, art theory and politics. The opinions of John Berger quoted at the beginning of this chapter and the following quotation from Roland Barthes give an indication of the possible power of image/text combinations for productive compositional purposes.

Formerly, the image illustrated the text (made it clearer); today, the text loads the image, burdening it with a culture, a moral, an imagination. Formerly, there was reduction from text to image; today there is amplification from one to the other. (Barthes, p.26)

What draws me to the image/text score is grounded in its potential creativity, brought about by the dichotomy inferred through the juxtaposition of the competing means of conveying language. In the case of the score it is the text that offers resistance and rigidity and the subjective interpretation of the image that allows for flexibility. Barthes talks about images having primacy, which is quite possibly true. However, this is not *always* true and we know that this truth can be subverted. Here John Lely talks about the different perspectives that text can create with even minor changes in grammar:

Such choices have considerable implications, both for the processes that may feature in a verbal score and for how that score might be interpreted... ... The inherent flexibility of the English language means that different grammatical structures can be used to refer to an activity in a variety of ways. (Lely and Saunders, p.3)

In this regard the composer must therefore acknowledge the subjective nature of the arrangement of the text and image on the score. Indeed the ebb and flow between the two is fundamental to any sonic interpretation. However, the works are very clear in one aspect: what is required of the performer is complete surrender to the process. The compositions only work if the performer is prepared to do this; it is a job of work. So in this sense the scores are both completely open and completely rigid, some more so than others. They can "be used to magnify, obscure, dramatize, or

re-direct words and images. It can be powerful, elegant, banal, or irrelevant. It's not inherently anything at all, but pure potential" (Miller, p.218).

4.4 Street Machines

Street Machines is an on-going project that involves making and presenting field recordings of machinery being used in the environment. I am taken with how musical the machinery can be when set in this context. The sound of two hedge trimmers 'playing' together, where by highlighting the different power ratio of the machines one experiences the audible differential in pitch range, which creates a clear harmonic relationship between the two. This is audibly reinforced as the individual motors are forced to slow down and therefore change pitch, as they cut through obstinate branches. The players/machines seem to interact dynamically with one another as if in an improvised musical discourse. Occasionally, one machine dominates as if performing a solo while the other provides bedrock consisting of deep snarling sound. That there is music in the sounds of street machines is only acceptable should you wish it to be so, however, "by embracing interpretation as part of the actuality of the real. This is at least what I consider to be exciting" (Voegelin, p.16). By placing these recordings in a domain where they can be consumed as music, I bestow that quality upon them. An acoustic engineer friend of mine overheard the *chainsaw* piece and remarked that he spent his days trying to rid the world of such noise; I can assure the reader that the irony is not lost on me.

4.5 Shackle – Improvisation technique workshops

A two-day improvisation workshop and concert organised by a post-graduate colleague Phil McGuire with Shackle, who are Anne La Berge, (flute and electronics) and Robert van Heumen, (electronics).

Shackle is a multiplayer music game, conceived by Anne and Robert as a means of removing the total randomness of improvisation and introducing guidance and therefore structure, not unlike a version of Oblique Strategies⁷ designed by Brian Eno and Peter Schmidt but for improvising musicians to use in real time performance. Players are given a common prompt to which they respond. This has potential to direct the improvisational process and restricts the random quality that is apparent in most so-called 'free' improvisation. The overall sound produced was of a group of musicians connected, as if the playing was loosely composed. Perhaps this is where the system is interesting, it differs from composed music not wholly because it is improvisation, but because any individual within the group has the ability to alter the direction, by refusing and replacing a prompt at any time.

During performance one should still be mindful of the group structure; listening remains a primary consideration. In my opinion, the concert was the least successful performance of the many we took part in for two reasons. First, the group had really done their best work during the workshops; perhaps improvisation fatigue had become apparent. Second, and perhaps more importantly, the prompting system, which is set up to display randomly, produced a much less successful range of choices. It is ironic that a system that creates a framework for improved performance should occasionally be faulty, when for the most part it worked so well. I think that perhaps the more playful, exploratory playing happened during the workshop where players were more likely to take control over what to play, which is a prominent feature of the 'game'. However, a certain level of confidence is required to change the course and perhaps players were less inclined to enforce a situation during performance, preferring to sit out sections rather than change them.

Despite the minor flaws, it proved to be an extremely interesting workshop, full of powerful,

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⁷ Information regarding Oblique Strategies can be found here: http://www.enoshop.co.uk/product/oblique-strategies?filter=Oblique%20Strategies

practical ideas for improving improvisational practice. It also gave me the opportunity of playing with some very different performers, forcing me to think outside the framework that is provided by my solo performative practice as "ultimately the greatest rewards in free improvisation are to be gained in playing with other people.... The essence of improvisation, its intuitive, telepathic foundation, is best explored in a group situation" (Bailey, p.112). For that, Shackle was both an interesting experiment and for me a successful encounter.

5. Conclusion – What's next?

Much of what I have explored throughout this thesis is at least in part concerned with resistance. I have discussed how resistance is required to make something worthwhile, as being necessary for art to succeed. Whether I, as a composer, offer resistance to a musician through rigidity or flexibility within a score or I incorporate some form of resistance, through dissonance and noise, within the fixed studio work; acting in opposition to complete freedom or openness where flexibility and rigidity in a work offers different levels of resistance through which the musician or listener must negotiate.

Through my work as a composer I set out to negotiate sound, silence and noise, specifically by setting notions of melody in opposition to notions of noise. I contend that melody is resistant to destruction, which perhaps subverts the suggestion that a combination of melody and noise would result in *just* noise. "Trouble is that noises are never just sounds and the sounds they mask are never just sounds: they are also ideas of noise" (Kahn, p.20). At the risk of stating the obvious, all sounds contain noise, even those sounds that we would not consider to be noisy. Medieval liturgical singing appears on the surface to be the antithesis of what we would consider to be noise and yet the opposite is true. There is the noise inherent in an individual singer's voice, the harsh sound of a consonant, the clicks and breath, "indeed, even the purest sung or spoken vowels contain aperiodic, non-harmonic components" (Cassidy, p.33). There is also, as large as life, the reverberant noise of the architecture, both in the recording and in the room where it is heard. In fact I conclude that without noise there little left with which to engage, indeed as Henry Cowell so eloquently puts it: "the noise-element has been to music as sex to humanity, essential to its existence" (Kahn, p.82).

The extreme of this argument is that sound and noise as melody is everywhere and in everything we hear, which is the equivalent of a discursive cul-de-sac that exists between Cage's idea of all non-intentional sounding as music and the *always* sound that can never end. As I suggest in the *Street Machines* project, melody cannot be segregated. It does not occur independently or in isolation; it requires its other to exist. The apparent noisiness of the machines through engagement or negotiation becomes musical. One encounters pitch, timbre and pulse, which are all ingredients for musical production to exist.

What the *Collided Voices* project illustrates is that melody and noise are able to not only co-exist but also be interdependent, that without noise there is no music. Noise is as much part of melody as is the melody itself; perhaps this is why it is so resistant to destruction. Through the process of collision it becomes a different version of the same thing. The analogy I make at the beginning of this essay of the car crash that creates new shapes—crumpled and disfigured, emerging from the rigid surface of the vehicle's steel body—are indeed just that: new 'musical' shapes. It requires us to not only engage with the overall image or vista but also to focus more of our attention on the detail for us to experience this fully; it is through negotiation that we find the most reward.

Aurality and the modern urban landscape as motivation for intermedia analysis forms the basis for the beginning of my further study. I am particularly interested in the area of influence architecture might have on musical production, which also has some connection with the work on *Collided Voices*. City architecture and the urban landscape can offer much in terms of aural stimuli, not necessarily in terms of recording directly from the field, but moreover in the way the built environment can influence strategies for music production, performative practice, sonic art, photography and the moving image. Drawing on influences from architecture, urban environmental studies and urban ecology as well as sonic art, music and acoustics I aim to explore the relationship between aurality and the built urban environment. Any sense of what an urban environment might represent emerges out of association and cognition of the 'place'. I will be exploring the notion that through

abstract form, metaphor and practical research there can be a sonic framework to describe the urban environment.

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