



INTIME 2015 Symposium

**Saturday, 24 October 2015
and
Sunday, 25 October 2015**

**Coventry University
Ellen Terry Building**

— PROGRAMME BOOKLET —

INTIME 2015 Symposium

(Interrogations Into Music Experimentation)

is an applied research group in the School of Art and Design, Coventry University

Tom Williams, INTIME Research Leader and Symposium Chair

ACKNOWLEDGMENTS

SYMPOSIUM STEERING COMMITTEE

Adam Collis

Dr John Habron

Dr Christopher Hobbs

Nick Peters

Daren Pickles

Yiorgis Sakellariou

John Yaffé

EVENT COORDINATION

Julia Baron, *Events Coordinator*

INTIME 2015 ADMINISTRATIVE ASSOCIATE

Yiorgis Sakellariou

TECHNICAL STAFF

Technical Coordinator: Daren Pickles

Sound Engineering: Paul Adkins, Adrian Petrisor

Theatre Technicians: Jon Constable, Nathan Fitzpatrick

STUDENT ASSISTANTS

Daula Banaddawa

William Cameron

Jon-James Hunt

Daniel Leather

Natalie Rumble

Christopher Wood

INTIME would also like to express its gratitude to the following people,

Without whose support and assistance INTIME would not be possible:

Prof Martin Woolley, *Associate Dean, Research*

Dr Sara Reed, *Head of Performing Arts*

Gillian Flanagan-Jones, *Clerical Assistant*

Nanette Brock, *Research Administrator*

INTIME 2015 Symposium

Saturday, 24 October 2015

and

Sunday, 25 October 2015

Coventry University, Ellen Terry Building (ET)

SATURDAY, 24 OCTOBER 2015

8:30 Registration and Refreshments (Ground Floor Foyer)

—

9:30 WELCOME (ETG34)

Tom Williams

—

9:45 PAPER SESSION I (ETG34)

Chair: Adam Collis

Playing Space (10')

Roberto Zanata

The modern city is a space filled with signs and sensory stimulations. Therefore, if we go beyond the supremacy of the sight sense, a study of aesthetological nature on the sound characteristics of the city, and on our capacities of turning them into experience through hearing, will allow us to perform a new range of analysis clearly rooted in phenomenology. Being meant as invisible and incorporeal cultural goods changing due to variable factors, the sounding landscape becomes exposed to the reflections of urban aesthetics, thus helping a new “sensory” approach to city planning in order to carry on a kind of urban exploration aiming at enhancing modes of perception that have been neglected up to now. Although this study should be necessarily compared with the analyses Murray Schafer made in his *Sounding City*, the guideline of the present research will embrace a phenomenological approach. Thus, we will concentrate on hearing by comparing it with sight; and with reference to Mikel Dufrenne's remarks in *The Eye and the Ear*, we will focus on the differences between the ear and the eye: ‘The ear has no eyelids’, writes Schafer, and while ‘the eye goes outside, the ear goes inside. It absorbs information.’

Sounds of the City (10')

Elizabeth Cackett

Inspired by Pierre Schaeffer's four modes of listening and my experience at Musarc's Field Studies course, the aim for this piece was to explore the constant pulse and rhythmic soundscape of the city using simultaneous field recordings taken from various static locations within a car park and narrate what was heard. An emergency services siren, a plane flying overhead, a street encounter and the sounds emanating from an adjacent building site provided a variety of motifs, textures, and sonic interest. ‘How much I prefer them in their raw state; rather than in the state of vague composition’ (Schaeffer) resonated with my response to and usage of the car park field recordings. The embodiment of this space allowed for the listener to be transported around the car park exploring how acoustics of an open but defined space within a city affects sound. It also highlights the effects sound can have on mental and physical states as narrated by “the pulse of the city never stops” implying our inability to relax and instead be influenced by the constant influx and somewhat intrusion of sound. The in-

tention of a narration using the four modalities to explicate what is heard in the soundscape was to give the listener a continuous theme to a piece that is compromised, in essence, of sonic fragments. Furthermore, the piece allows for people to consider the impact of sound on our lives once they have gained a deeper awareness of it.

Sonic Composition through Improvisation with the Landscape: Monsal Head (edited extract) (25')

Dallas Simpson

The work involves performance and creation of sound compositions by engaging with landscapes at various locations as acts of live location performance using elements of prepared and unprepared environments. It involves the utilisation of personal intervention as the creative force for the 'sonication' of silent elements at the location. In addition to sounding the environment and incorporating the natural soundscape, the perceptual spatial choreography (movement and localisation) of sounds in three-dimensional space is an essential part of the live compositional process.

CHATTER - mimicking space and the 'concept of being elsewhere' (10')

David Watt

CHATTER (2015) is a work influenced by concepts of proximal and distal space and to mimic "the ephemeral experience of being elsewhere" (Harrison 2013). Discussion will centre on the aims of the work: to mimic the 'chatter', rhythms, chorus and aural soundscape created by the Provençale cicadas utilised through a network of surrogate computer-based phonic manipulations. Occupying the lavender bushes and mimosas that inhabit the Var hillsides, the listener's attention is drawn to the flocking, granular and antiphonal movement of the cicada soundscape. This is reinforced by those insects that occupy a proximal, almost personal, space and those from a distal space, through reflections from the physical terrain. Compositional factors within the work will be discussed: the constraints of a restricted sonic palette, the development of phonic rhythms which mimic the cicada chorus, using electroacoustic and electronica techniques that exploit a multi-dimensional space through the transformation process and the application of a multidimensional mimetic space (Fischman 2008) based upon Emmerson's *Language Grid* (Emmerson 1986).

Selva di varie intonazioni: Baroque organ sounds and contemporary acousmatic music: on a sound identity of Venice (10')

Michele Del Prete

The sounds of Venice are generally associated with pre-modernity (both the sounds of its soundscape and the sounds of its musical tradition). This picture is obsolete: first the soundscape of Venice is a not a pre-modern one, secondly after the experimental research in electronic music conducted by Maderna and Nono (and more recently by Boldrin and Costanza), a truly contemporary (site-specific) electroacoustic practice has been established (also) in Venice. In this frame though, Venetian sounds of past centuries can be still considered essential for contemporary electroacoustic practice in Venice. I will give an artistic presentation of my work *Selva di varie intonazioni* (2013, 9'54", 8 tracks) an electroacoustic piece based on organ literature, on organ sounds, and on the spatiality of the Venetian *polychorality*. The work title may be translated as 'Wood of

Various Intonations' (wood as both matter and place), and it is a reference to a genre of Early Baroque Venetian music, the *intonazione* (intonation) - a short keyboard piece whose goal was to establish (through its final chord) a pitch that served as a reference for the next piece. In composing my piece, I translated this coming-to-a-pitch (the process of intonation) in electroacoustic terms. I worked with instruments that allowed me to focus on pitch modification and pitch reconstruction. The piece is based on concrete sounds I recorded in the Frari Church, Venice, a building that hosts two notable 18th-century organs.

10:55 Mid-Morning Refreshment Break (Ground Floor Foyer)

11:15 PAPER SESSION II (ETG34)

Chair: Christopher Hobbs

***Making Place - landscapes in interactive sound and text* (10')**

Katharine Norman

My work traverses and transgresses disciplinary boundaries as much as possible. I set out to integrate sonic and textual interactivity in mutually interdependent ways. Much of my creative and scholarly work (also mutually interdependent) is concerned with landscape and environment, particularly in relation to quotidian experience. I'll discuss this in relation to three works: *Window* (online or iOS app), in which the reader/listener composes a work from moving sounds and texts in space and makes a 'landscape'; *Making Place*, an interactive performed work that was written for one or two players, and in which a poetic text is created and animated through their live musical interaction; and *Paul's Walk*, a new work for iPad and performer, in which the text is drawn from the performer's response to a simple brief: 'describe or share a walk, of any kind'. The interactive visual rendition of the digital text is then created through their live musical performance. Designed to require relatively little specialist knowledge to set up and perform, *Paul's Walk* attempts to involve performers in bringing experimental interactive, sonic-digital writing to a more conventional music performance context to reach a different audience.

***Norman Nicholson's Landscape - Seven Rocks* (10')**

J. Harry Whalley

This presentation will cover the compositional ideas behind the piece *Seven Rocks* based on a poem of the same name by Norman Nicholson. Nicholson wrote with insight and sensitivity about the interrelationship between mankind and nature, with a particular feeling for the way in which the underlying geology of a region shapes both the landscape and the people. In-fact this set of poems is in the order of their geological formation. He draws our attention to the inherent beauty that is around us in a warm and considered way that doesn't shy from literal representation and straightforward language. The sequence of poems *The Seven Rocks*, published in Nicholson's 1954 collection *The Pot Geranium*, formed the basis for the composition. The 'Seven Rocks' in question are the main types of rock from which Greater Lakeland is formed: Skiddaw Slate; Scafell Ash; Conistone Flag; Eskdale Granite; Mountain Limestone; Maryport Coal; and St. Bees Sandstone. The composition will be performed by either a string trio (original setting), or re-arranged for string quartet to be performed by the Gildas Quartet (www.gildasquartet.com). The performance length is approx. 20 minutes including reading of excerpts of the poem — read by the composer. The composition

was commissioned by the Norman Nicholson Society with support of the Britten-Pears Foundation.

No sweeter sound than my own name (10')

Beavan Flanagan

This work amplifies the internal soundscape of the vocal apparatus using contact microphones placed on the performer's throat. These internal sounds are then manipulated digitally in real time and subsequently diffused through small speakers woven into the fabric of the performer's clothing. Thus the performer's body becomes a sonic landscape through which the highly intimate, internal sounds of the voice become audible. Drawing from the theoretical work of Marshall McLuhan, Friedrich Kittler, and Alexander Galloway, we aim to unpack the modern conditions under which humans are no longer an extension of their technology, but are instead fully imbricated within their technological environments. At the heart of this imbrication lie questions regarding interfacing strategies that drive our collaboration: How does technology influence us as sonic creatures? How does our evolving relationship with technology — it being an increasingly intimate, personalized, customized, worn experience — affect us in bodily ways? Rather than understanding digital technologies as a force that disconnects us from our bodies, this project chooses to explore the ways in which they cause us to inhabit and reconfigure our bodies, increasing our awareness to the relationship between our physical presence in the world and the technological environments we have constructed.

Dynamic cross-domain expression: notation, interpretation, technology and performance (25')

Richard Hoadley

Shroud is a musical response to the poem of the same name by George Mackay Brown. Each of the flutes (piccolo/alto) has an embouchure microphone that feeds to real-time signal processing, created in the Max programming language. The electronic sound is produced over an arc of five loudspeakers. The electronic sounds are of two main kinds: timbral alterations of the live flute sound that are played over a central speaker, so that there is fusion between acoustic and electronic components, anchored to the physical flute; and antiphonal fields reproduced over the wider loudspeakers, whose energy feeds or is driven by the flute. Shroud was originally written in 2003 then revised in 2007. The electronics were rebuilt in 2015, and this is the subject of a paper submitted to INTIME: 'Rehearseability' and 'chase' strategies in music for live performers and electronics.

Planes of Invention – Plotting Landscapes in Electro-Acoustic Composition (10')

Neil Ó Connor

When composing, two paradigms become evident concerning the desired degree of 'textuality' (interactivity, pre-determined, linear) or 'interactivity' (highly autonomous systems) that appear. Many works fall within a continuum (transformative, generative, or sequenced) between these two extremes, hosting a combination of fusion, conflict, continuity, and contrast that help present various planes of sound. These landscapes are articulated through processing, the compositional processes and techniques such as the acceleration/deceleration of

tempo and the increasing/decreasing of density. These processes help develop the idea of ‘planes of invention’ that this composer seeks to find through electroacoustic composition. The piece *Erstwhile* was composed using SPEAR — an application for audio analysis, editing, and synthesis. A signal that closely resembles the original input sound (a re-synthesis) can be generated by computing and adding all of the individual time varying sinusoidal waves together. Several acoustic and found sounds were combined to create the sound world within this piece, which relies on varying degrees of increasing/decreasing the density of sonic landscapes. Through this process, it was possible to configure, mutate, and transpose sounds to any degree imaginable, arranging dense landscapes that the composer could arrange into sub-structures of sound spectra, plotting planes of invention.

12:30 Buffet Lunch (Ground Floor Foyer)

— Please visit the installations in ET128 (Ben Potts)
and ET113 Live Room (Dallas Simpson) —

13:30 CONCERT I

| | |
|---------------------------------|-----------------------------------|
| ELIZABETH CACKETT | <i>Sounds of the City</i> |
| MICHELE DEL PRETE | <i>Selva di varie intonazioni</i> |
| NEIL Ó CONNOR | <i>Erstwhile</i> |
| TIM HOWLE (video: Nick Cope) | <i>Flags</i> |

14:15 Break

14:30 CONCERT II

| | |
|---------------------|--|
| YIORGIS SAKELLARIOU | <i>In Aulis (excerpt)</i> |
| DAVID WATT | <i>CHATTER</i> |
| ROBERTO ZANATA | <i>Camera Ear</i> |
| NEAL FARWELL | <i>Shroud, for piccolo / alto flute and electronics</i> Karin de Fleyt, flute |

15:30 Break

15:45 KEYNOTE SESSION I

Chair: Tom Williams

Sound and Wonder

Keynote Speaker: Ray Lee

Ray Lee’s large-scale sound installations and performances have been presented all over the world. In this talk he considers if the physicality of sound, and what happens when sound moves, can intensify a live musical experience and lead to a more profound engagement from the audience, creating a sense of wonder.

16:30 Break

16:45 PAPER SESSION III (ETG34)

Chair: Nicole Panizza

Flags (10')

Tim Howle

(video: Nick Cope)

Previous pieces have been subject to a 'cartoonification' of sound where a great deal of sound organisation is aligned to phase-like visual material. This piece is gentle by comparison. The approach attempts limited levels of intervention that chime with the images. The exploitation of the inherent musicality of the images emphasises timelessness and continuity through an improvisational approach, mirroring and counterpointing objects in the image. The limited indeterminate relationship of the layers of musical material allows for shifts with regard to each other, resulting in harmonious and gestural relationships regardless of juxtaposition. Sounds are selected from a limited palette. For screen performance, the music is fixed; however, we are also working on an endless looped version for installation.

***Fleeting Strands* (10')**

Ambrose Seddon

This paper explores the thinking behind the author's stereo acousmatic composition *Fleeting Strands*, considering how the notions of landscape and environment are consciously embedded within the music. The work is primarily based around field recordings made in two British coastal locations, capturing sounds such as beach surf, caves, boatyards, church bells, and impacts and scrapes from pebbles and rocks. The composition is defined by both the spaces and environments suggested by these materials in their raw states, and the new spaces and environments evoked when they are transformed and combined. The work will be discussed in terms of the main environments encountered, how these were used when structuring piece, how they were developed and transformed to create new, yet related, environments, and how the processes of rupture and shift (between contrasting spaces) were employed as key compositional devices.

***The Use of Sound as Sculpture: A Unity of Sound, Space and Human Perception* (10')**

Ben Potts

Space and environment is explored through many different mediums and forms in contemporary art. The author will discuss examples of how space can be used in art, such as in visual works by artists Richard Serra and Dan Flavin, a sound art installation from John Wynne, as well as one of his own pieces, '___'. The works of these artists demonstrate the activation or framing of space which is to be inhabited by the viewer or listener. They employ boundaries that function to define the space in which the audience can engage and experience, or in the case of Flavin, 'invigorate "dead space" bringing awareness to often unused areas of the installation space' (National Gallery, n.d.). This can create a visceral and physical experience in which the human perception of space can be altered and manipulated, and a void can become solid. Human perception of physicality adds to this experience through resonance with the human body, thus adding another layer to the spatial immersive experience. An example of this is Distortion Production Otoacoustic Emissions, which cause the cochlea to emit its own frequen-

cy. The authors work, ‘_—’ allows the audience to literally feel the space creating a tangible experience. The work explores how space can be an experience and how the audience’s movement can change the composition.

***Dark landscapes in the music of Castilla-Avila* (25’)**

Agustin Castilla-Avila

Colour is a very important element in my compositional processes. Sometimes I use the length of the string between left hand and upper nut, preparations or specific *scordatura* to change the resonance of the instrument in order to obtain more intimate and ‘darker landscapes’ in my music. I will present three of my compositions where I used these processes: *Im Dunkel* (In Darkness) for flute, alto flute and guitar; *Landschaft am See mit Kometen* (Lake Landscape with Comets) for flute, cello and guitar; and *Mondnacht* (Moon Night) for soprano and guitar.

—
17:45 Dinner Break

—
19:30 CONCERT III (University Square)

RAY LEE

Chorus

—
20:00 Move to Ellen Terry Building

—
20:15 CONCERT IV

J. HARRY WHALLEY

Seven Rocks

Christopher Jones; violin, Kay Stephen, viola;
Anna Menzies, cello

RICHARD HOADLEY
Poetry by Katharine Norman

How To Play the Piano in 88 Notes

piano: Philip Mead

KATHARINE NORMAN

Making Place

Kate Halsall, piano

BEAVAN FLANAGAN
and MICHAEL BALDWIN

No sweeter sound than my own name

AMBROSE SEDDON

Fleeting Strands

21:30 End of Symposium Day 1

SUNDAY, 25 OCTOBER 2015

9:00 Registration and Refreshments (ET Ground Floor Foyer)

—
9:30 PAPER SESSION IV (ETG34)

Chair: John Habron

***Golden Sunset, Blue Rain: The Musical Relationship Between Landscapes and Environments in Shamanism* (10’)**

Nicholas Peters

This paper explores the relationship between shamanic music and the themes of landscapes and environments within shamanic practices. This short paper will form a theoretical basis for my proposed performance work *Golden Sunset, Blue Rain*. From time immemorial, shamans the world over have utilised sound and music as a fundamental tool to alter their states of consciousness in order to undertake their spiritual journeying practices, be it for acquiring knowledge, power, or helping other persons (for example, undertaking journeys for healing, soul retrieval, and animal spirit recovery). As the most ancient of the world's spiritual practices, shamanism can be traced back to native North and South America, aboriginal Australia, Siberia, Central Asia, and eastern and northernmost Europe. As a result, the specific shamanic methods and the use of sound and music from each of these areas of the world undoubtedly vary, although the fundamental shamanic principles are consistent throughout. This paper will further explore the relationship between these various methods and their use of music and sound. In order to establish the significance and importance of the use of music and sound in shamanic practices, it will also be necessary to briefly explain the nature of landscapes and environments from the shaman's perspective.

Inversions (10')

Annie Mahtani

Inversions began as a live improvisation that was performed as part of the public art exhibition, *Minimum Monument* by Brazilian artist Néle Azevedo. This introduction to the piece will discuss the development of the original project and the process of re-contextualization of the material into a concert work, with a particular focus on approaches to composing for large-scale multichannel loudspeaker arrays.

Rehearsability and "chase" strategies in music for live performers and electronics (25')

Neal Farwell

In rehearsing chamber music, performers usually want to be able to stop and restart the music, exploring and fixing musical and technical questions. The other players know how to re-unify the sounding result so that the full vertical texture is immediately back in play. When live electronics are involved, this is harder. The composite sound may comprise elements or layers that have been set in motion at different previous points in time, or which 'remember' the past in various ways. What is to be restarted, and how? The 'chase events' mechanism implemented in many MIDI sequencers offers a partial model: if the MIDI sequence is restarted from an arbitrary point, previous notes may be re-sounded, and pitch-bend and controllers chased back to their last values. However, the decisions are not simple. Attack envelopes or timbral evolution may sound wrong if restarted. The 'best' controller values may be ambiguous. Time-based structures such as sampled drum loops may be hard to re-synchronize. In a live work, where the electronics may store and reprocess the acoustic sound, or be dependent on tempo, pitch or spectral analysis from the material actually played, there are further challenges. As a case study, this paper looks at my work *Shroud* (2003/2007) for flute and electronics. I rebuilt the electronics in 2015 to streamline the implementation and rework its rehearsal structures. The complexity of this task surprised me, and it leads also to questions about compositional strategy.

***Transient evoked otoacoustic emissions in Transcape* (10')**

Brian Connolly

This paper addresses the application of transient evoked otoacoustic emissions (TEOAEs) as a compositional device in the author's own composition *Transcape*. Otoacoustic emissions (OAEs) are physical sounds generated by the inner ear that are transmitted backwards, out from the ear, in response to certain stimuli. While OAEs were first discovered by David Kemp in 1977, research into musical applications of this psychoacoustic phenomenon is relatively rare and, more specifically, previous studies concerning TEOAEs as a musical tool are almost non-existent. *Transcape* is part of a portfolio of groundbreaking research into the potential of the ear as an instrument. Through analysis of the three short sections in *Transcape*, this paper presents a concise demonstration of how TEOAEs can be provoked in the inner ear and the creative potential of the resulting sonic material such as timbre modulation and filling 'silence'. With the use of visualisation software this paper reveals what sounds are being generated in the listener's ears and not from the loudspeakers. With a compositional methodology similar to the minimalist style of Alvin Lucier, and stylistic considerations similar to those of Maryanne Amacher, *Transcape* is an ideal platform upon which the potential of TEOAEs in composition can be investigated. *Transcape* reverses the role of the ear from being a submissive receiver to an active participant in composition thus opening up an exciting level of opportunity for the composer.

***Living Waves: Geological Music* (10')**

Robert MacKay

This piece was created using the sounds of ringing stones. It was commissioned for the Ruskin Rocks Project (www.leeds.ac.uk/ruskinrocks), which brought together musicians (including Dame Evelyn Glennie) and scientists to create two 21st-century *lithophones* (designed by Dr Kia Ng, University of Leeds) and Marcus de Mowbray (freelance musical instrument maker) to be housed at Brantwood, the former home of artist, naturalist, and social commentator John Ruskin, now a museum situated in the Lake District. The two tuned percussion instruments have been created from ringing rock extracted from several Cumbrian Quarries. *Living Waves* has been inspired by the thoughts, writings, and paintings of Ruskin. It is the subtitle he himself gave to *Deucalion*, his book on geology. Mountains are viewed as fluid and dynamic forms, living waves created by the shifting of the earth's crust. Through the compositional process, I have tried to mirror Ruskin's visual explorations from a sonic perspective, using a range of transformational techniques to convey repeated patterns in different soundscapes at both the micro and macro level. In the context of this piece, I have also interpreted the three Medieval divisions of music interpreted as 1) sounds naturally occurring in nature, 2) speech and the sound of manmade machinery, and 3) instrumental sounds (in this case improvisations on the new Brantwood Musical Stones, played by percussionist Dame Evelyn Glennie). The Ruskin Rocks project was funded by Natural England through Defra's Aggregated Levy Sustainability Fund and was co-ordinated by Bobbie Millar.

10:40 Mid-Morning Refreshment Break (Ground Floor Foyer)

11:00 PAPER SESSION V (ETG34)

Chair: Chris Evans

***Sonic Topographies: Temple of Artemis, Aulis* (10')**

Yiorgis Sakellariou

In June 2015, I was invited by Implode, an artistic platform dedicated to new forms of sound and visual arts, to participate in Sonic Topographies, a two-week residency focusing on locations with unique historical and cultural background. I worked at the ruins of the ancient Greek temple of Artemis in Aulis and responded artistically to the location with the aim of creating an acousmatic composition. According to the myth, the temple of Artemis was where the Greeks would sacrifice Iphigeneia, general Agamemnon's daughter, in order to please the goddess and depart to Troy. Her unfortunate story was vividly described by Euripides in his tragedy *Iphigeneia in Aulis*. Through the act of environmental recording, I explored the location of the ruins, looking also into the myths and history related to it. The sonic exploration around the temple raised questions about the relation between music, myth, and sacrifice. In his famous book *Noise – The Political Economy of Music*, Jacques Attali writes that 'listening to music is to attend a ritual murder'. How can this be interpreted in acousmatic composition and performance? Is there a relation between the ruins of an ancient temple and the theatre space at Coventry University?

***Conceptual Modes from Soundscape to Acousmatic. Dealing with Soundscape in a Compositional Framework* (25')**

Huw McGregor

This paper addresses the way space is used within electroacoustic compositions, focusing particularly on the inclusion of soundscape recordings within such works. The implications of juxtaposing soundscape recordings onto more esoteric or abstract acousmatic material within a piece will be considered with reference to my own recent compositions. In order to do this, the paper will examine varied listening approaches and behaviours that are psycho-acoustically linked to environment, memory, and chemical behaviour. The depth of phenomenology that becomes apparent in such an examination reveals the depth of our conceptual thinking when exploring some of the external boundaries of space and temporal space, both within a compositional framework and as observers of the world around us.

***Meditating on landscapes* (10')**

Tom Williams

With reference to recent collaborations of mine that explore notions of landscape, this presentation will examine the collaborative process when working with text, the voice, and the electroacoustic in the evocation of 'place'.

***Tomba Emmanuelle* (25')**

Michael Francis Duch

In this paper, I will focus on the making of a piece I have written for double bass, recorded in 2013, and released the following year. It is based on extended instrumental techniques, acoustic effects such as beatings, and the interplay between the performer and the acoustics of the room it is performed in. *Tomba Emmanuelle* is the name of the tomb in the Emanuel Vigeland Museum in Oslo, where the recording of this piece was made. It is an unedited concert recording of a piece I have been working on since it was first commissioned by nyMusikk Bergen in 2012. It is for one or more bass instruments exploring different regi-

sters, timbres and acoustic effects of their instruments and their relation to the room it is being performed in. The first performance was with four bass students from the Grieg Academy in a silo in Bergen in October 2012. The second performance featured seven of my bass students at Norwegian University of Science and Technology (NTNU) at NTNU University Museum in Trondheim in May 2013. The third was a solo performance recorded in Oslo a few days later and is the one featured on the album *Tomba Emmanuelle* released by the Norwegian label SOFA in 2014.

12:30 Buffet Lunch (Ground Floor Foyer)

— Please visit the installations in ET128 (Ben Potts)
and ET113 Live Room (Dallas Simpson) —

13:30 CONCERT V

| | |
|-----------------|---------------------------------|
| NICHOLAS PETERS | <i>Golden Sunset, Blue Rain</i> |
| ANNIE MAHTANI | <i>Inversions</i> |
| BRIAN CONNOLLY | <i>Transcape</i> |
| ROBERT MACKAY | <i>Living Waves</i> |

14:15 Mid-Afternoon Refreshment Break (Ground Floor Foyer)

14:30 KEYNOTE SESSION II (ET233)

Chair: Tom Williams

Keynote Speaker: John Young

Four Takes on Transformation

In electroacoustic music, we typically think of transformation as an integral part of the compositional process, the manipulation of the form and fabric of sound; that is to say: technical methods of shaping and refashioning sonic objects. For most musicians working in electroacoustic music, transformation in this sense is emblematic of what is really original in the genre. However, a compositional journey that deals in the transformation of sound has other far-reaching impacts on musical experience. In this keynote talk, four perspectives on transformation in musical thinking will be offered: objects, meanings, styles, and the creative process.

15:15 Break

15:30 PAPER SESSION VI (ETG34)

Chair: Nicholas Peters

***Fluid Dynamics in Instrumental Acoustics* (25')**

Saif Bunni

How fluid dynamics can be used as means of controlling the resonant frequency matrix of the resonator of a musical instrument. The 'piano stick' is a strings-on-a-stick, hand-made, high-tension instrument using piano wire stretched on a one-metre metal hollow rectangular profile body resonator. No stick exceeds 50 millimetres in width, and each can have up to six strings. The performer can shift the resonant frequencies of the body of the instrument through gestural move-

ment, which will shift a small volume of water housed inside the body. The water also adds another timbral dimension to traditional musical instruments in addition to adding an element of interactivity and the gestural motion of the performer. The instrument is amplified using a piezoelectric sensor embedded in the body of the instrument. The instrument can be plucked or played using a bow, mallet, and/or other common percussive tools available.

Pastorale-Mechanical (Imagined landscapes between determinate systems and poetic fantasy) (25')

Jim Dickinson

This paper presents an intermedial approach to the analysis of two musical works, both of which seek to create a sonic analogue of the same Paul Klee painting: *The Twittering Machine* (1922, 151). Andrew May's electroacoustic composition *Twittering Machine* (after Paul Klee) (1998), and Harrison Birtwistle's avant-garde piece *Carmen Arcadie Mechanicae Perpetuum* (1977). In this painting, Klee has created a strange mechanical automaton superimposed onto a colour field that suggests an otherworldly landscape beyond the constraints of physical time. Both musical works seek to create sonic analogues for the mysterious and complex imaginary world that Klee has created. I will compare the approaches of these compositions, focusing on the balance between deterministic systems versus intuitive decision making in their compositional methodology. It was Stockhausen who declared Klee 'the greatest teacher of composition' when handing his *Bauhaus Notebooks 'Das bildnerische Denken'* ('Artistic Thought') to Pierre Boulez. After viewing Paul Klee's landscape *On the Edge of a Fertile Land* Boulez stated that "If the structuring becomes too strong and forces the poetry to simply not exist, then one situates oneself, yes, on the border of the fertile country, next door to the unfruitful...If structure forces the imagination to enter into a new poetry, then one is, in reality, in the fertile country." It is this balance between system and self within Klee's 'imagined worlds' that is at the heart of the creative legacy to which Stockhausen alludes.

16:30 Break

16:45 CONCERT VI

TOM WILLIAMS

Meditations on a Landscape

Juliana Janes-Yaffé, soprano

HUW MCGREGOR

Metronic

MICHAEL FRANCIS DUCH

Tomba Emmanuelle

Michael Francis Duch, double bass

JOHN YOUNG

Brink

18:00 Symposium End

CONCERT PROGRAMME NOTES

CONCERT I

Sunday, October 25

ELIZABETH CACKETT *Sounds of the City*

Sounds of the City is a soundscape piece that explores the constant pulse and rhythmic soundscape of the city using simultaneous field recordings taken from various static locations within a car park, with narration of what is heard. The embodiment of this space allowed for the listener to be transported around the car park, exploring how acoustics of an open but defined space within a city affects sound. It also highlights the effects sound can have on mental and physical states as narrated by “the pulse of the city never stops,” implying our inability to relax and instead be influenced by the constant influx and somewhat intrusion of sound.

MICHELE DEL PRETE *Selva di varie intonazioni*

This piece is based on the sound of the organ of the Frari Church in Venice, Italy. The work can be considered a dialogue within a baroque sonic environment.

NEIL Ó CONNOR *Erstwhile*

Erstwhile was composed using SPEAR, an application for audio analysis, editing, and synthesis. A signal that closely resembles the original input sound (a re-synthesis) can be generated by computing and adding all of the individual time varying sinusoidal waves together. Several acoustic and found sounds were combined to create the sound-world within this piece, which relies on varying degrees of increasing/decreasing the density of sonic landscapes. Through this process, it was possible to configure, mutate, and transpose sounds to any degree imaginable, arranging dense landscapes that the composer could arrange into sub-structures of sound spectra, plotting planes of invention.

TIM HOWLE *Flags*

(video by Nick Cope)

Using visual techniques analogous to methods of electroacoustic composition, *Flags* builds on a series of collaborations between the two practitioners. The piece is in two parts of different lengths running simultaneously. The work contains several scenes of a row of prayer flags blowing in the wind on the side of a hill in Tibet. Musical phrases mirror the behaviour of the flags and also act as a sonic version of the visual landscape corresponding to distance and depth of field. Separate recordings were made at different locations, and the binary structure allows for a significant discussion of landscape. In front of the lens, the flags form a collective image. Ropes on which the flags are connected act as a timeless fundamental, frequencies forming spatial ‘chords’. The formal musical elements within the piece are inspired by Cornelius Cardew’s *Autumn ’60* for orchestra; improvisation is used in the creation of the musical phrases and on a more structural level; and sections of music have a limited indeterminate relationship with each other. The musical lines interact in simple, predictable ways in the space between the three video projections. The approach is free within prescribed limits. Thus, the ‘electroacoustic movie’ is augmented with the inclusion of the Cardew influence. For screen performance, the music is fixed — it is a snapshot of the process.

CONCERT II

YIORGIS SAKELLARIOU *In Aulis* (excerpt)

‘And you, young

women, sing a propitious song for my fate, a song in praise of Zeus’s daughter Artemis. Let the Greeks keep propitious silence.’

(Euripides, *Iphigeneia in Aulis*, lines 1467-1470)

DAVID WATT *CHATTER*

CHATTER (2015) is a work influenced by concepts of proximal and distal space (Smalley 2007) and the mimicking of “the ephemeral experience of being elsewhere” (Harrison 2013). The piece explores the landscape of the coastal region of Var (Southern France), particularly the flocking, oscillating landscape of the cicada chorus.

ROBERTO ZANATA *Camera Ear*

The basic idea of *Camera Ear* (2015) is to use the technique of the segmenter to segment some audio files and then extract some feature description of these chunks, providing a measure of the *peakiness* of the

average spectrum or computing the average spectral centre of mass of a chunk's frames. I used lot of strategies to operate on these chunks (reorder them somehow) and to generate an edit decision list, which I have synthesized with the open-source synthesizer SuperCollider, setting the number of beats/measures, the number of positions to rotate, and the direction of rotation, preserving much of the sonic structure of the input while swapping similar chunks from different parts of the sound. An ear is always something disturbing, or, as Freud would say, 'uncanny' ('das Unheimliche'). An ear is an organ familiar to us, yet it embraces all the power of the mask and of what goes beyond its function as an organ: the listening. Unlike animals, human beings are prone to desire and capable of navigating through the imaginary capture. By isolating the auditive function against a hypothetical hyper-stimulation, a man is able to stay inside the imaginary (illusionary) fluctuation, thanks to the audition that, just like a frame, prevents him from slipping into deception. An ear, whether it is real or simulated, is always the trace of a presence.

NEAL FARWELL *Shroud*
(Karin de Fleyt, flautist)

Shroud is a musical response to the poem of the same name by George Mackay Brown. Each of the flutes (piccolo/alto) has an embouchure microphone that feeds to real-time signal processing, created in the Max programming language. The electronic sound is produced over an arc of five loudspeakers. The electronic sounds are of two main kinds, 1) timbral alterations of the live flute sound that are played over a central speaker, so that there is fusion between acoustic and electronic components, anchored to the physical flute, and 2) antiphonal fields reproduced over the wider loudspeakers, whose energy feeds, or is driven, by the flute. *Shroud* was originally written in 2003 and was revised in 2007. The electronics were rebuilt in 2015, and this is the subject of a paper submitted to INTIME 2015: *Rehearseability and 'chase' strategies in music for live performers and electronics'*

CONCERT III

RAY LEE *Chorus*

Towering above the audience is a series of giant metal tripods support rotating arms. At the end of each arm, loudspeakers emit precisely tuned musical pitches creating a pulsating, harmonic drone, singing out a hypnotic siren call to all those present. Red lights at the end of the arms create the effect of a whirling swarm of fireflies, or of planets in motion, like mesmerising orbits of colour. These intersecting lights trace rings above the heads of the audience, while the combined chorus of the spinning speakers creates a cohesive harmonious whole, a 'sticky flux' that is both uplifting and transfixing.

CONCERT IV

J. HARRY WHALLEY *Seven Rocks*

(Christopher Jones, violinist; Kay Stephen, violist; Anna Menzies, cellist)

The sequence of poems *The Seven Rocks*, published in Nicholson's 1954 collection *The Pot Geranium*, formed the basis for this composition. The 'Seven Rocks' in question are the main types of rock from which Greater Lakeland is formed: Skiddaw Slate, Scafell Ash, Coniston Flag, Eskdale Granite, Mountain Limestone, Maryport Coal, and St. Bees Sandstone. The music reflects the processes that each rock undertook in its formation, for example extreme pressure or slow *layerings*. These ideas are moulded into a more abstract appreciation of the landscape or rock. Slate, for example, is formed of large, fairly featureless slabs with very sharp edges, is reflected in the musical texture. The human voice also forms an important part of the composition, with selected quotations from each poem in the sequence preceding its associated movement.

RICHARD HOADLEY *How To Play the Piano in 88 Notes*

(poetry by Katharine Norman; Philip Mead, pianist)

How to Play the Piano in 88 Notes is one of a number of compositions that together form *Piano Glyphs*, a piece investigating live notations and cross-domain expression. *How to Play the Piano* involves live analysis of the reading of an original piece of poetry (by composer and writer Katharine Norman) to generate audio and live notation for simultaneous display. In the first part of the piece, the poem is algorithmically remodelled textually, graphically, aurally, and orally. The music is created live through a combination of prepared programming and elements of live coding. All material is produced or processed and generated live. Notation (including music, text, and graphics) is dynamically created at the time of performance in response to various data sources. Features of this use of live notation include the exploitation of performers' instrumental proficiency and learned responses; the use of common practice notation, as well as graphic techniques, to optimise virtuosity and encourage improvisation; and the synchronisation of notation with live performance and physical action and the investigation of novel forms of notation. The music is programmed using SuperCollider and INScore.

KATHARINE NORMAN *Making Place*
(Kate Halsall, pianist)

The work is an interactive work about landscape and place, visual and audio allegories of 'place-making', and wayfaring. It uses (my) text on place as its material. Images and field recordings of a place (which can be varied) form a significant part of the work.

AMBROSE SEDDON *Fleeting Strands*

The strands in this work are both literal and metaphorical. The work is based on a number of field recordings made in two British coastal locations, capturing the sounds of beach surf, caves, boatyards, church bells, an open fire, and impacts and scrapes from pebbles and rocks. One of the chief aims of the composition was to work with spatial impressions and settings as a means of structuring the music on a more global level. While the sources are revealed, the music is also concerned with the different spaces or settings encountered on a journey of transformed realities and shifting perspectives.

BEAVAN FLANAGAN and MICHAEL BALDWIN *No sweeter sound than my own name*

This composition for voice and live electronics, entitled *No sweeter sound than my own name*, explores the vocal tract as sonic environment. The work amplifies the internal soundscape of the vocal apparatus using contact microphones placed on the performer's throat. These internal sounds are then manipulated digitally in real time by the composer and subsequently diffused through small speakers woven into the fabric of the performer's clothing. Thus the performer's body becomes a landscape through which the highly intimate, internal sounds of the voice become audible. Ultimately, the piece is about the modern conditions under which humans are fully imbricated within their technological environments. At the heart of this imbrication are questions regarding interfacing strategies: How does technology influence us as sonic creatures? How does our evolving relationship with technology — it being an increasingly intimate, personalized, customized, worn experience — affect our bodily environment?

Sunday, October 25

CONCERT V

NICHOLAS PETERS *Golden Sunset, Blue Rain*

Golden Sunset, Blue Rain is an ongoing live solo electroacoustic work created for the purposes of shamanic journeying and inner meditation. This ongoing work features the voice of the maker performing a mélange of spiritual chants that catalyse as a personal shamanic power song, in order to induce altered states of consciousness required for inner journeying. The work is experiential on both musical and spiritual levels, and, over the last two years, it has been developed to include the sounds of Scottish tin whistles, Tibetan singing bowls and field recordings, alongside the voice and live DSP. The sounds are manipulated in real time using Ableton Live software.

ANNIE MAHTANI *Inversions*

Inversions began as a live improvisatory piece to be performed alongside Nélé Azevedo's *Minimum Monument* project in Birmingham in 2014. *Minimum Monument* is an open-air exhibition displaying 5000 figures made of ice, inverting the official canons of the monument. In Azevedo's words: "In the place of the hero, the anonym; in the place of the solidity of the stone, the ephemeral ice; in the place of the monumental scale, the minimum scale of the perishable bodies. Thousands of small sculptures of ice are placed in public space. The memory is inscribed in the photographic image and shared by everyone. It is no longer reserved to great heroes nor to great monuments. It loses its static condition to gain fluidity in the urban displacement and in the change of state of the water. It concentrates small sculptures of small men, the common men." The sound material was recorded during the exhibition's two-week creation period — an intensive production line of delicate sculpting, chiselling and freezing. The fragility of the solitary figures transform into a majestic army, as the microscopic sounds of each sculpture multiply in the thousands.

BRIAN CONNOLLY *Transcape*

The non-linearities of the inner ear are responsible for otoacoustic emissions that cause the ear to produce its own audible sounds when provoked by certain stimuli. *Transcape* generates transient-evoked otoacoustic emissions (TEOAEs) in the listener's ears, which become the cornerstones of the work itself. This work directly investigates TEOAEs through the use of noise/tone bursts and clicks within an artistic context. A powerful sensory journey is experienced in *Transcape*. Each listener will hear their own version of the work in many respects, as the type and intensity of these 'phantom' tones are listener-specific. A short passage of this piece containing no speaker signal allows the listener to become fully aware of their ears' performance. *Transcape* causes the listener's ears to become instruments. The ear is

no longer a passive sensory organ in the listening experience; here, it is considered to be an active participant in the creative process.

ROBERT MacKAY *Living Waves*

This piece was created using the sounds of ringing stones. It was commissioned for the Ruskin Rocks Project (www.leeds.ac.uk/ruskinrocks), which brought together musicians (including Dame Evelyn Glennie) and scientists to create two 21st-century *lithophones* (designed by Dr Kia Ng, University of Leeds) and Marcus de Mowbray (freelance musical instrument maker) to be housed at Brantwood, the former home of artist, naturalist, and social commentator John Ruskin, and now a museum situated in the Lake District. The two tuned percussion instruments have been created from ringing rock extracted from several Cumbrian Quarries. *Living Waves* has been inspired by the thoughts, writings and paintings of Ruskin. It is the subtitle he himself gave to *Deucalion*, his book on geology. Mountains are viewed as fluid and dynamic forms, living waves created by the shifting of the earth's crust. Through the compositional process, I have tried to mirror Ruskin's visual explorations from a sonic perspective, using a range of transformational techniques to convey repeated patterns in different soundscapes at both the *micro* and *macro* level. In the context of this piece, I have also interpreted the three Medieval divisions of music interpreted as 1) sounds naturally occurring in nature, 2) speech and the sound of manmade machinery, and 3) instrumental sounds (in this case, improvisations on the new Brantwood Musical Stones, played by percussionist Dame Evelyn Glennie). The Ruskin Rocks project was funded by Natural England through Defra's Aggregated Levy Sustainability Fund and was coordinated by Bobbie Millar.

CONCERT VI

TOM WILLIAMS *Meditations on a Landscape*

(Juliana Janes-Yaffé, soprano)

Meditations on a Landscape is a song cycle for soprano, live processing, and fixed media. It has, from the very start, been a close collaborative project with the internationally acclaimed, UK-based American soprano Juliana Janes-Yaffé. The cycle is currently three songs, with a fourth song in planning. The texts of these songs are from the poetry of Penny Ann Windsor. Her volume *On the Edges of My Skirt* explore the poet's return to the land of her childhood, the Somerset Levels (in the South West of England), reflecting on the land, waterscapes, and the change of seasons. This is reclaimed land from the sea that has a natural tendency to flood. These songs explore musically some of the images and qualities embedded in the poetry. The composition is a personal musical reflection upon the land and the singer's (poet's) relationship to it. The fixed media includes sounds recorded from the landscape and electroacoustically transformed. The titles of the three songs are as follows: 'Bleak' / 'Helter Skelter' / 'Invitation'. Special thanks go to Sean Osler for developing the Max patches for the live vocal processing.

HUW MCGREGOR *Metronic*

Metronic is a soundscape of the Metro in Athens in 2014. The soundscape is an unusual *athraphonic* lattice, which requires no treatment to express its sonic diversity. To explore this as a study in my theory, I selected two sine waves for left and right speakers, which would express their gestural signatures in the acousmatic field of the performance space. The sine waves give no more impression than exactly what they stand for, pulsating sonic certainties that explore a given space or a synthesized voice performed in abstract and crystalized within the sound field of the performance space. The soundscape of the Athens Metro sits within distal space, and the sounds are within proximity, and do not explore the depths of the observable space, but are within an enclosed environment of perception. However, the recording acquires another level of depth as the sound travels to a from the tunnels; and as the sound is received and perceived, we are most certainly exploring the depths of the observable space as the train moves down the tunnel. These parameters demonstrate the opportunity to showcase the depth from mind space to the observable space. This was achieved as the train sound would glissando upward with more ferocity, the soundscape would be subtly taken over by the sound wave as the train would begin to glissando downward, and fading out of the soundscape, leaving the sine wave in its simplest form and at its peak — completing the transcending mode from observable space to mind space.

JOHN YOUNG *Brink*

In *Brink*, I have tried to convey a form projecting continuous sonic renewal and evolution. I like to think of sound as physical matter, and by blending parallel processes of transformation and recurrence, the work aims to evoke a sense of material consistently on the verge of leading toward a new state, or re-solving into one that might be anticipated by the imaginative listener. *Brink* was composed in the electroacoustic music studio of Bowling Green State University, Ohio (U.S.A.), on a Klingler Electro-acoustic Residency in April and May of 2015. It was premiered in the Limonaia di Villa Strozzi, at the Rewind Festival, Tempo Reale, Florence, on 29th September 2015.

MICHAEL FRANCIS DUCH *Tomba Emmanuelle*

Tomba Emmanuelle is a piece for one or more bass instruments exploring the different registers, timbres, and acoustic effects of their instruments and their relation to the room in which it is being performed.

INSTALLATIONS

BEN POTTS

__-- is an installation that comprised of a stereo sound piece and a visual sculpture. The sound piece is composed of processed sound recordings from the playing of the visual sculpture and electronically synthesised sounds. The sculpture is placed in the centre of the room, while the sound piece is played on a loop through stereo speakers. The audience is invited to walk around the space to gain a 360-degree perspective of the sculpture. While they are moving around the space, the audience's perception of the sonic piece will be also be changing and adjusting to their movement. This is achieved by using distortion product otoacoustic emissions, which are supplementary tones that the cochlea creates itself. These tones, or distortion products, adjust with movement of the head. The piece explores the physicality of space, space as an experience, and how the movement in space can be used to create personal compositions.

DALLAS SIMPSON

Monsal Head is a free-form environmental sound composition working with the environment around Monsal Head, Monsal Dale, Derbyshire. The work includes live intuitive performance with viaduct railings, found stones and brickwork, The Headstone Tunnel, track gravel, concrete path, tunnel concrete, water, and various metal fittings.

COMPOSER/PERFORMER BIOGRAPHIES

(in alphabetical order)

Saif Bunni

A graduate of BA Sound Arts and Design, London College of Communication. Saif Bunni is a musician, maker, workshop organiser, improviser and sound researcher. He works closely with the hacking community here in East London, to establish a multi-disciplinary practice in making sound (Hackoustic.org). He also makes many other things such as metal string instruments.

Elizabeth Cackett

Elizabeth Cackett's creative practice lies in sound art and electronic music with particular interest in creating pieces using real world recordings and manipulated vocals. She recently completed my MMus in Creative Music Technology via part time distance learning with the Royal Welsh College of Music & Drama. My app 'Spatial Wanderings', which is based on themes of meditation and mindfulness, and includes four pieces of electroacoustic music with sounds on each page for users to manipulate and control (created in MAX) was exhibited at Atmospheres Festival as part of the InstallEnrichRepeat series in May this year.

Agustin Castilla-Avila

Agustin Castilla-Avila was born in Jerez, Spain. He studied guitar at the Conservatorio Superior de Sevilla. He did further studies at London College of Music with guitarist C. Bonell, at the Guildhall School of Music with guitarist R. Brightmore and the composer M. King; at the Mozarteum (Salzburg) with I. Siewers; and at Arizona State University with F. Koonce. He did composition studies at Mozarteum under A. Hölszky and R. Febel and at Luxemburg Consevatoire with A. Müllenbach. He has participated in masterclasses with D. Russell, M. Barrueco, R. Dyens, etc.; and from S. Sciarrino, D. Schnebel, C. Halffter, and others. He has taught at Ceuta Conservatory, Lucena Conservatory (Spain) and at Arizona State University. He has had concerts in Europe, Asia and the U.S. His music has been conducted by D. Russell-Davies, T. Ceccherini, J. Kalitzke, H. Lintu, A. Soriano, H. Schellenberger, among others. He has written solo, chamber music, orchestral, music for the theatre and dance, and four chamber operas. His music is published by Doblinger Verlag. He has been awarded with the Music Prize 2013 from the Region of Salzburg.

Brian Connolly

Brian Connolly is a fourth-year PhD student from Dublin with research interests in the application of psychoacoustic phenomena concerning the non-linearities of the inner ear within composition. Since starting his PhD in 2012 at Maynooth University, Brian has composed the music for Keith Barry's *The Dark Side* tour as well as having written and presented a documentary exploring computer music in Ireland for RTÉ lyric fm entitled *Why Music Can't Stay Still*. Brian's research has obtained assistance from

Alvin Lucier and Jacob Kirkegaard, and in 2015 alone, the composer's groundbreaking research into the ear as an instrument has been showcased in Europe, Asia, and North America.

Michele Del Prete

Michele Del Prete received his PhD in Philosophy from the Freie Universität Berlin. He has presented papers on philosophy and music aesthetics at Harvard and Cambridge, and in Paris, Jerusalem, Toronto, Mannheim, Rome, Helsinki, Darmstadt, Frankfurt, Palermo (with Pierluigi Billone), and elsewhere. He earned his diploma in Electronic Music at the Conservatory of Venice, studying with Alvise Vidolin, and his diploma in Composition at the Kunstuniversität Graz, studying with Beat Furrer. Performances include Novara (Galleria UXA), Venice (Teatrino Groggia, Music Biennale, Odhecaton 2013), Graz (Open Cube IEM, Impuls 2011-Signale Graz), Rome (EMUFest), Berlin (Unerhörte Musik BKA), Barcelona (Zeppelin Festival), Boston (Csound Conference 2013), University of Kent (Symposium of Acoustic Ecology 2013), São Paulo (FILE 2014), Padua (SMUG 2014), Madrid (Espacios Sonoros 2014) LAC 2015 (Mainz) and elsewhere. He currently teaches Aesthetics at the Academy of Fine Arts of Foggia, Italy.

Jim Dickinson

Jim Dickinson is the subject leader of Commercial Music at Bath Spa University. His research focus concerns intermedial analysis of musical works, based on the paintings of Paul Klee. His industry experience includes eleven hit singles and four hit albums including a 'number one'. He has also composed for video games and is in the final stages of his PhD (awaiting Viva).

Michael Francis Duch

Michael Francis Duch is a Norwegian bass player and Associate Professor at the Norwegian University of Science and Technology (NTNU). He has been involved in more than 50 recordings released in various formats, including two solo albums, and has played concerts in Europe, Asia, and North America. He plays in a trio with Rhodri Davies and John Tilbury, the rock band Dog & Sky, the improv quartet LEMUR with Bjørnar Habbestad, Hild Sofie Tafjord, Lene Grenager, and various other constellations. Ad hoc collaborations include Pauline Oliveros, Mats Gustafsson, Christian Wolff, Tony Conrad, Joëlle Léandre, amongst others. He completed his project *Free Improvisation – Method and Genre: Artistic Research in Free Improvisation and Improvisation in Experimental Music* as a research fellow at NTNU in October 2010.

Neal Farwell

Neal Farwell composes acoustic, acousmatic, and mixed electroacoustic music. He gained his PhD in composition from the University of East Anglia, studying with Simon Waters. In 1998, he moved to the U.S. as a Knox Fellow at Harvard University, and continued his studies with Bernard Rands, Mario Davidovsky, and David Rakowski. Since January 2002, he has taught at the University of Bristol, UK, where he is Reader in Composition and Director of the Composition and Recording Studios. Neal is active also as a performer, regularly conducting the University of Bristol Symphony Orchestra and New Music Ensemble, working with outside ensembles, and presenting the electroacoustic concert series Sonic Voyages.

Beavan Flanagan

Beavan Flanagan is a composer from Montreal, currently based in Huddersfield, UK. He composes both instrumental and electronic music in addition to more experimental sound works. His music has been performed at several international festivals including Expo Milan 2015 (IT), Gaudeamus Muziekweek (NL), Huddersfield Contemporary Music Festival (UK), Nief-Norf Summer Festival (US), and nu:nord (CA/NO/UK). He is currently working on a PhD at the University of Huddersfield, where he is the HCMF//CeReNem Scholar in Composition.

Richard Hoadley

In recent years Richard Hoadley has composed using his own systems of physical computing and algorithmic generation that together make original compositions in real time. He has developed a number of devices that investigate and facilitate physical interactions with musically expressive algorithms for installations, performances (including dance) and therapeutic environments. *Calder's Violin* included methods for the live presentation of algorithmically generated music notation. In *Semaphore*, physical movement and algorithms combine with live notation in simultaneous performances of cross-domain expression, while in *How To Play the Piano*, he combines live text and live music notation in an exploration of the areas between interpretation and improvisation.

Tim Howle

Tim Howle is Professor of Contemporary Music at University of Kent. He has previously held posts at Hull and Oxford Brookes Universities. He read music at Keele University, studying under Roger Marsh and

Mike Vaughan, and completing a doctorate in composition in 1999. His work focuses on sonic art including fixed media pieces, live electronics, and audio-visual compositions. His collaborator Nick Cope is Associate Professor in the Department of English, Culture, and Communication at Xi'an Jiaotong University, Liverpool University, and Suzhou University. Previously, he had been Senior Lecturer in Video and New Media Production at Sunderland University. He has collaborated with Cabaret Voltaire, the Butthole Surfers, O yuki Conjugate, and Electribe 101. Recent work has included projection work for public arts projects and installation collaborations. Nick Cope is a graduate of Sheffield Hallam University.

Juliana Janes-Yaffé

UK-based soprano and vocal tutor Juliana Janes-Yaffé's repertoire encompasses over thirty opera roles, a broad cross-section of the Italian, French, German, and American art song literature, and most of the major oratorio solos. She has worked closely with numerous contemporary composers, inspiring works written especially for her. She has been heard as a soloist in at the Brooklyn Academy of Music, Lincoln Center Festival, 92nd Street Y, Steirischer Herbst Festival (Austria), and with Cygnus, the Friends and Enemies of New Music, the Concordia Orchestra, Colorado Springs Symphony, Brooklyn Philharmonic, Dallas Symphony, Oakland Symphony, San Jose Symphony, Florida Philharmonic, Istanbul Philharmonic, Orchester der deutschen Oper Berlin, Tokyo City Philharmonic, Orquestra del Teatro Colón (Buenos Aires), Orchestra dell'Opera di Genova, Südwestdeutsche Philharmonie, Symphonie-Orchester Graunke (Munich), Alt-Wiener-Strauss-Ensemble, and the Orchestra of The 92nd Street Y. She has sung solo recitals in France, Germany, Italy, Switzerland, and the U.S. She is currently touring worldwide with her *Yiddish Folksong Project*. She received BMus degrees in Vocal Performance and Music Education from Southern Methodist University, and was subsequently engaged as a Principal Soloist at the opera house in Münster, Germany. Over twelve years, she was a contracted soloist also in the opera houses of Essen and Stuttgart. Guest engagements found her in San Francisco, New York, Darmstadt, Aachen, Osnabrück, Kassel, Berlin, and Miami. In 1992, she resumed her studies, receiving her Master of Music Degree in Vocal Performance from Boston University, where she was a Dean's Scholar. She was (from 1995 to 2014) Head of Vocal Studies at the Mannes College of Music (New York) Pre-Conservatoire Division, and for many years on staff at New York University, where she also headed the modules in German and French Lyric Diction for Singers. She currently lectures in music at Coventry University.

Ray Lee

Ray Lee is fascinated with what happens when sound moves. He creates spinning, whirling, and pendulous sound installations/performances that explore 'circles of ether', the invisible forces that surround us. His large-scale works have toured to more than twenty different countries across three continents, and he has won numerous awards including at Ars Electronica and the British Composer Awards (Sonic Arts Category).

Rob Mackay

Rob Mackay is a composer, sound artist, and performer. He is currently a Senior Lecturer in Music at the University of Hull. Recent projects have moved towards a cross-disciplinary approach, including geology, soundscape ecology, theatre, audiovisual installation work, and human-computer interaction. His work has been performed in 18 countries (including several performances on BBC Radio 3, BBC Radio 1, and Radio France), and a number of his pieces have received international awards (Bourges, EAR, La Muse en Circuit). He has held composer residencies at Slovak Radio (Bratislava), La Muse en Circuit (Paris), the Tyrone Guthrie Arts Centre (Ireland), Habitación del Ruido (Mexico City), and CMMAS (Morelia). His latest project was a collaboration with poet John Wedgwood Clarke for the Arts Council funded Dictionary of Stone. This was a natural progression from working on a number of projects based on the theme of geology, including a collaboration with percussionist Dame Evelyn Glennie on the Natural England funded Ruskin Rocks project, led by a team of scientists and musicians at the University of Leeds who have created two new stone instruments (lithophones): www.leeds.ac.uk/ruskinrocks He has also created a Jurassic soundscape for Scarborough's Rotunda museum which is currently installed. His works can be heard on: www.soundcloud.com/robflute

Annie Mahtani

Annie Mahtani is a composer and sound artist working and living in Birmingham. After completing her doctoral studies in composition in 2008 she has worked as a freelance composer, performer, curator, and educator. As a composer, Annie has collaborated with dance and theatre performers and worked on a number of site-specific installations. Her work has been performed extensively in concerts, conferences, and festivals internationally. She has completed a number of commissions including those from the University of Birmingham, Rosie Kay Dance Company, Birmingham Hippodrome, Jazzlines and PRS Women in Music. She is a lecturer in Electroacoustic Composition at The University of Birmingham. She is also

co-director of SOUNDkitchen, a Birmingham-based organisation, which she founded in 2010, dedicated to promoting local sound artists and composers.

Huw McGregor

Huw McGregor is a composer of acoustic and electroacoustic composition. He takes a deep interest in sonic research, and through experimentation and exploration he exploits his interests in electroacoustic form. Through recording and listening to soundscapes, he enjoys finding new concepts that he then incorporates into his compositions. His acoustic compositions take several forms, a more relaxed blues and jazz form, and one that takes its cues from classic early film music. Another form he explores is a more contemporary contemplative style, with deep rhythmical poly- and cross-rhythms. Piano improvisations are another form of expression he enjoys, which are expressions on a single idea or thought. These works are relaxed in nature and contemplative.

Katharine Norman

Katharine Norman is a composer, sound artist, writer and coder, who composes music for instruments and digital resources with (currently) a particular focus on digital work, involving text and/or piano, about 'place' and our response to it. Her work is performed internationally, and several pianists, including Kate Halsall, Philip Mead, Stephen Gutman, and Xenia Pestova, have championed her music for piano and piano with electronics. More information on her work can be found at www.novamara.com and Soundcloud, as well as several CDs, including *Innova*, *Metier*, and *NMC*. She was awarded the 2012 New Media Writing Prize for her interactive sound essay *Window* — also selected for the Electronic Literature Collection (Electronic Literature Organization) 2015. She has received various grants, commissions, prizes, and recognition for her music and sound art from the Fulbright Commission, Arts Council of England, Canada Council for the Arts, the Britten-Pears Foundation, ASCAP, the Noroit Competition, Bourges International Composition Competition, the ISCM World Music Days, among others.

Neil Ó Connor

Neil Ó Connor has been involved in experimental, electronic, and electroacoustic music for the past 16 years and has toured extensively in Ireland, Europe, Australia, Asia and the U.S. His work has been shown/performed at Resonances Festival @ IRCAM Paris, Kunsthalle Berlin, Massachusetts Museum of Modern Art, Institute of Contemporary Art (London), and he has held residencies at the Massachusetts Museum of Modern Art (U.S.) and EMS – Swedish Institute of Electro-Acoustic Music (Stockholm). As a composer, Neil has written for solo, duo, string quartet, large ensemble, and orchestra, along with mixed media projects and has recently worked with the Bang on a Can Ensemble and David Crowell (Phillip Glass Ensemble). Academically, Neil has been lecturing in Music and Audio Production for seven years at Trinity College, Art Institute of California (San Francisco), and at the Institute of Audio Research, New York City. Guest lectures include New York University and Princeton (New Jersey) University. He is currently a lecturer in Applied Music and Audio Production at Dundalk Institute of Technology, Co. Louth, Ireland. Neil is represented in Ireland by the CMC (Contemporary Music Center), ICC (Irish Composers Collective) and published by IMRO (Irish Musical Rights Organization).

Nicholas Peters

Nicholas Peters specialises in making music for shamanic journeying and meditation. He has also composed and performed music for a variety of creative projects, including works for theatre, contemporary dance, moving image, and site-specific installations, alongside working as a Score Reader in live television. Nicholas currently works as an Hourly Paid Lecturer at Coventry University where he is also reading towards his PhD. He is a member of the Central Composers' Alliance and, in October 2014, he was selected by the Alliance as the 'Composer of the Month'. Committed to spreading the joy of music to all ages, Nicholas also teaches evening classes for the Coventry Music Appreciation Group. Website: www.nicholaspeters.co.uk

Ben Potts

Ben Nigel Potts is an artist exploring the relationship between sound art and sculpture. His focus is on the physical and spatial potential of sound and its effect on the human senses. He also works with visual objects using their musical and sonic capabilities. This year will see Ben perform at Electric Spring Festival and present papers at The University of Leeds and The Toronto International Electroacoustic Symposium. Ben is currently completing his PhD at the University of Huddersfield supervised by Michael Clarke and Monty Adkins.

Seth Rozanoff

Seth Rozanoff has participated in a number of concerts as a performer and composer in the U.S., Netherlands, UK, Sweden, and Denmark. He was associated with Newband (The Harry Partch Ensemble),

Tactus, Anechoic, Tonal Center, and CIRCE groups in New York. He is a PhD candidate at The University of Glasgow in the School of Culture and Creative Arts, supervised by Nick Fells. He has been the recipient of a Fulbright Scholarship (to The Netherlands) and a Santander Mobility Award (to Brazil). He has received other grants from the Netherland-America Foundation and The University of Glasgow. His main focus is setting up live instrumental performers as source material for computer synthesis applying studio techniques. Recent pieces have included a work for bass recorder and electronics for Monica Schmidt Andersen, performances with electric guitarist Olivier Jambois, as well as performance with percussionist David Stockard. Recent residencies include STEIM (Amsterdam) and EMS (Stockholm).

Yiorgis Sakellariou

Yiorgis Sakellariou is an electroacoustic music composer. Having a background in classical and Mediterranean folk music, he came to develop his personal language during the early '00s. Since then, he has been active internationally, responsible for solo and collaboration albums, having composed music for short films and theatrical performances, leading workshops, and tirelessly performing his music around the globe. His practice is founded on the digital manipulation of environmental recordings. His palette of sounds is all encompassing, from vibrating rail tracks to refrigerator static, and from noisy waterfalls to the humming of insects. His current research as a PhD student at Coventry University focuses on the relationship between electroacoustic music and the use of sound in ecstatic religious practices. He is a member of the Athenian Contemporary Music Research Centre and the Hellenic Electroacoustic Music Composers Association.

Since 2004 he has curated the record label Echomusic <http://mechaorga.wordpress.com>

Ambrose Seddon

Ambrose Seddon is an electroacoustic composer whose work has been performed internationally in concert and on radio, receiving competition prizes and special mentions including 1st Prize - Klang! Electroacoustic Composition Competition 2014; Special Mention - Métamorphoses Acousmatic Composition Competition 2012; Special Mention - Foundation Destellos International Competition of Electroacoustic Composition and Visual-Music 2010; European Region Composition Prize - ICMC 2007 (International Computer Music Conference); and 1st Prize - Visiones Sonoras Electroacoustic Music Composition Competition 2006. His research interests include compositional structuring processes and music analysis, and he has presented at various international conferences and festivals. With a background in electronica and experimental pop music, he continually strives to integrate new and varied approaches into his compositional language. Ambrose is a lecturer in Music and Audio Technology at Bournemouth University.

Dallas Simpson

Dallas Simpson has been performing live improvised sound works since around 1995 and has released occasional works on CD and numerous works through the Internet.

David Watt

David Watt is a Lecturer in Music and Subject Leader at the University of Highlands and Islands, Perth College. His research interests lie in the application of transformation, particularly in narrative, vocal, and audio-visual forms.

J. Harry Whalley

Originally from Belfast but now based in Edinburgh, Harry Whalley is a composer of contemporary classical, film, and electroacoustic music. His works have been performed around the world, from New York to Vancouver as well as around the UK and Ireland. World-class music groups such as the Hebrides Ensemble, Artisan Trio, Red Note Ensemble, Vancouver Miniaturists Ensemble, Gildas Quartet, Edinburgh Quartet, Ensemble Eunoia, and many others have performed his music. In addition, he has composed the scores for film and computer games that have been featured at film festivals around the world, including Palm Springs, Los Angeles, Berlin, and London. He received a Bucher-Fraser Scholarship for post-graduate study and was awarded an MMus in composition with distinction by the University of Edinburgh in 2010. Additionally, he received a fully funded AHRC PhD studentship, which was passed without correction in 2014. Notable works include *Entangled Music* (for chamber orchestra) based on the underlying concepts in Douglas Hofstadter's seminal work *Gödel Escher Bach*; *Jammerwoch* (for solo soprano and orchestra), first performed by Peyee Chen and ECME, and conducted by James Lowe, in 2013; *Clap Together Beta*, which features an EEG headset as a control device, described in the *Scotsman* review as 'unforgettable'.

Tom Williams

Tom Williams is an award-winning composer who specialises in electroacoustic music composition. He studied composition at University of Huddersfield (BA), Keele University (MA) and Boston University

(DMA). His music has received numerous international performances and broadcasts; including BBC Radio 3, SEAMUS (Miami & Iowa), Sonorities (Belfast), EMMF (Kansas & Chicago), Huddersfield Contemporary Music Festival, Expo (Manchester and Scarborough), ACMC (Wellington and Brisbane), Futura (France), Weimar, Sonus and TES (Canada), NYCEMF (New York in 2011/13) and at ICMC conferences in New York, Barcelona, New Orleans, Ljubljana, Belfast and Perth, 2013. His song cycle *Like Oranges* received numerous international performances and broadcasts and was recorded on the Kitchenware label; *Ironwork* for piano and tape was an ALEA III prizewinning work in 1993; his acousmatic work *Can* won the Italian music medal 'Città di Udine' in 2010; *Shelter* received a honourable mention at IMEB, Bourge, 2006; and *Break* was a finalist of the 2004 Musica Viva competition. Recent collaborations have included the following: *Rip Tide* for the pianist Philip Mead; *Voice (a Retracing)* and *Home (a Replacing)* with the dancer/videographer Vida Midgelow; and *Dart*, for cello and electronics, for New York cellist Madeleine Shapiro. Ms Shapiro gave the world premiere performance of *Dart* in New York in 2012 and the UK premiere at the INTIME 2012 Symposium. Additionally, *Dart* was shortlisted for the British Composer Awards 2013 and is now available on Albany Records. Most recently, Tom Williams has collaborated with soprano Juliana Janes-Yaffé on the song cycle for voice, live electronics, and fixed media *Meditations on a Landscape*. He is currently Course Director of Music Composition and Leader of INTIME experimental music group at Coventry University. (More at www.tw-hear.com)

John Young

John Young is a composer whose output includes multi-channel acousmatic pieces, large-scale radio-phonetic work, and music combining instruments and electroacoustic sounds. His music focuses on the use of computer technology to transform, disassemble, and reassemble sounds in innovative ways to create sonic drama and musical development. This involves fusion of sounds recorded in natural environments with more abstract sounds developed through electroacoustic processes, drawing on the capacity of 'real-world' sound to evoke novel imagery and natural points of reference for listeners. Some of his recent work has used oral history and archival recordings in a narrative-based approach to electroacoustic music.

Roberto Zanata

Roberto Zanata was born in Cagliari, Italy, where he received his degree in Philosophy. A composer, musician, and musicologist in the area of electronic music, he studied and graduated in composition and electronic music at the Conservatory of Cagliari, Italy. In the middle of the 1990s, he became active in Italy and abroad. He wrote chamber music, music for theatre, computer music, electroacoustic, and acousmatic music as well as multimedia works. He teaches 'Musica applicata' at the Conservatory of Ferrara in Italy. His most recent credits include the 2009 Bourges Electroacoustic Music and Electronic Arts (France); 2010 and 2012 Emufest (Italy); 2012 Festival Spaziomusica (Italy); 2013 Di Stanze (Italy); 2013 Black&White Festival (Portugal); 2013 Supercollider Symposium Colorado (U.S.); 2013 Athens (Greece) Video Art Festival; 2014 Idee Fixe (Greece); 2014 Planétarium Sonore (France); 2014 Interfence Festival (Poland); 2014 Intermediale Festival (Poland); and the 2014 New York Electroacoustic Festival (U.S.).