



NOVA CONTEMPORARY MUSIC
MEETING INTERNATIONAL
CONFERENCE, 2023

3 TO 5 OF MAY

LISTENING TO TODAY'S MUSIC

CHAIR
ISABEL PIRES
FILIPA MAGALHÃES
RICCARDO WANKE

BOOK OF ABSTRACTS

NCMM
NOVA Contemporary Music Meeting

ALMADA NEGREIROS COLLEGE,
SCHOOL FOR SOCIAL SCIENCES AND HUMANITIES (FCSH),
NOVA UNIVERSITY, LISBON

GIMC
Contemporary Music
Research Group

CENTRO DE ESTUDOS DE
SOCIOLOGIA, ESTÉTICA E
MÚSICA
CIESEM

IN2PAST
INTERACÇÃO ENTRE O UNIVERSO DA MÚSICA E O UNIVERSO DA ARTE

NOVAFCSH
NOVA FACULTY OF SOCIAL SCIENCES AND HUMANITIES

b

fct
Fundação
para a Ciência
e a Tecnologia



Listening to Today's Music

Chair: Isabel Pires, Filipa Magalhães, Riccardo Wanke

Book of Abstracts

Lisbon

Portugal

3–5 Mai 2023

Colégio Almada Negreiros

Nova University Campus de Campolide

Nova Contemporary Music Meeting 2023

Listening to Today's Music

Conference Chair

Isabel Pires, Filipa Magalhães, Riccardo Wanke

Organizing Committee

Claudio de Pina, Ernesto Donoso, Luis Raimundo, Maria Inês Pires, Nariá Assis, Pedro F. Sousa

Management team and technical support

Cristiana Vicente, José Grossinho, Vera Inácio Cordeniz

Scientific Committee

Alejandro Reyna (Universidad Nacional del Litoral: Argentina), Ana Telles (CESEM — Évora University: Portugal), Azadeh Nilchiani (LISAA / UFR Lettres, Arts et Communication — Gustave Eiffel University: France), Björn Heile (School of Culture and Creative Arts — University of Glasgow: UK), Caroline Bøe (CNRS / PRISM — Aix Marseille University: France), Christine Esclapez (CNRS / PRISM — Aix Marseille University: France), Filipa Magalhães (CESEM — Nova University: Portugal), Gisele Pires Mota (Music Department — Brasília University), Ingrid Pustijanac (Dipartimento di Musicologia e Beni Culturali — University of Pavia: Italy), Isabel Pires (CESEM / FCSH — Nova University: Portugal), Ivan Moody (CESEM — Nova University: Portugal), Jonathan Hicks (School of Language, Literature, Music and Visual Culture — University of Aberdeen: UK), José Luis Besada (Complutense University of Madrid, Spain), José Oliveira Martins (Faculdade de Letras, Estudos Artísticos / Coimbra University: Portugal), Laura Zattra (IRCAM / Conservatories of Music of Parma and Rovigo: France/Italy), Luis Velasco-Pufleau (University of Bern: Germany / McGill University: Canada), Louisa Martin-Chevalier (Sorbonne University: France), Makis Solomos (MUSIDANCE / UFR Arts, Philosophie, Esthétique — Paris VIII University: France), Mariusz Kozak (Department of Music — Columbia University, USA), Mark Reybrouck (University of Leuven: Belgium), Martin Laliberté (LISAA / UFR Lettres, Arts et Communication — Gustave Eiffel University: France), Matthias Rebstock (Institute of Music and Musicology — University of Hildesheim: Germany), Miriam Akkermann (Institute for Art and Musicology, Department of Musicology — Dresden University of Technology Germany), Nikki Dibben (Department of Music — University of Salford: UK), Pierre Alexandre Tremblay (ReCePP / School of Music, Humanities and Media — Huddersfield University: UK), Riccardo Wanke (CESEM / FCSH — Nova University: Portugal), Rui Penha (ESMAE — Polytechnic Institute of Oporto: Portugal), Rui Pereira Jorge (CESEM / FCSH — Nova University: Portugal), Silvio Ferraz (São Paulo University: Brasil), Stephen McAdams (Schulich School of Music — McGill University: Canada), Tomás Henriques (Department of Music — State University of New York, USA)

Nova Contemporary Music Meeting (NCMM) is a biennial, 3-day international conference launched by the Contemporary Music Research Group (GIMC) of CESEM (Centre for the Study of the Sociology and Musical Aesthetics at Nova University, Lisbon) and focused on a variety of questions relating to music since the beginning of the 20th century. Music today is more diverse than ever. The variety of genres, practices, techniques, technologies, systems of dissemination and forms of reception, brings to a new context in which the foundation of previous assumptions is shaken, and new

paradigms are emerging. Music from the past, as well as from the present, is now omnipresent in our society, from the concert hall to the museum, from the media to public spaces, to private listening with headphones. As a result of each one of these and other situations, studying music is now challenging and depends on a multiplicity of artistic and scientific domains. In this context, NCMM was conceived as a contribution to the development of multidisciplinary and collaborative research in the field of contemporary music, and it consists in a research meeting that bring together researchers, musicologists, composers and performers, working with a diversity of areas related to contemporary music. With a special focus on the articulation between musical practices and research activities, whether theoretical or practice-based, NCMM intends to respond to the current challenges of contemporary music, in its artistic and research practices, offering a platform for proposing, discussing and disseminating knowledge in a variety of fields.

GIMC (Grupo de Investigação em Música Contemporânea) is one of the working groups, part of CESEM. Evaluated as “Excellent” by the European Science Foundation in 2014, CESEM is a research unit dedicated to studies on the phenomenon of Music from a great variety of points of view — sociological, aesthetic, historical, compositional, etc. —, through, both disciplinary and interdisciplinary, and its interaction between the various areas of Musicology and between these and the other Social and Human Sciences. Based at FCSH-UNL, this research center it includes researchers from Portugal and abroad. Strategic partnership agreements resulting in CESEM’s branches have been developed at Polytechnic Institute of Porto, Superior School of Music in Lisbon and Évora University.

GIMC brings together researchers, composers and performers, interested in the multiple possibilities of contemporary music and of interdisciplinary work in the music of the 20th and 21st centuries. Members of the group, all highly active and maintaining distinguished compositional and performing careers, have worked on music and technology and historical, analytical, aesthetic and performance issues in music both from Portugal and abroad.

Main research fields:

- Music and Contemporary Philosophy and Aesthetics;
- Electronic and Computer Music;
- Music and Image;
- Music and Sound Interactivity;
- Music and Sound Perception and Cognition;
- Music and Sound Space;
- Music Composition,
- Music Theory and Analysis,
- Musical Sound Representation and Music Notation;
- Performance and Reception;
- Portuguese Musical Heritage and Document Preservation;
- Sound technologies and Music Industry;

CESEM is a research unit devoted to the study of music and its correlation with other arts, culture and society, incorporating various approaches and making use of the latest perspectives and methodologies in Social and Human Sciences.

These are the general purposes of CESEM:

- Create a suitable environment for teamwork, organized to tackle the identified scientific needs and priorities;
- Support the research interests of its members and their participation in international professional venues, and the publication of the research results;
- Promote new collaborative research projects that deepen the knowledge and dissemination of Portuguese, Iberian and Latin American themes;
- Create new research tools, applications, and databases, allowing the international academic community to study local repertoires and other little explored objects as well as promoting the role of Music in contemporary Portuguese life;
- Foster a renewed atmosphere of research and debate, bringing its members together in a dynamic musicological community capable of maintaining excellence in postgraduate studies in Music.

Conference Program

PROGRAM

Wednesday, 3 May
Morning

08:30 **Registration**

09:30 **Opening session: Room CAN 223**

Conference Opening

Isabel Pires (CESEM: NOVA FCSH)

Institutional Presentation

Luisa Cymbron — Executive Director of the Centre for the Study of Sociology and Aesthetics of Music (CESEM) and representative of the Musical Sciences Department.

Rui Pedro Julião — Vice-Dean for Innovation, Value Creation and Campus Development as representative of the NOVA School for Social Sciences and Humanities (FCSH)

10:00 **keynote speech session: Room CAN 223**

Moderated by: **Isabel Pires**

Mark Reybrouck

Music listening as exploratory behaviour. Conceptual issues and underlying mechanisms

11:00 **Coffee Break**

11:15 **Panel 1: Room CAN 223**

Moderated by: **Riccardo Wanke**

Paal Fagerheim

Listening to the Beat in Silence: Investigations Into Silent Disco and Individual Listening In Collective Events

Piotr Kędziora

Why do we need, if we need it at all, the concept of ambient listening?

12:45 **Lunch**

Afternoon
Parallel Sessions

14:00 Panel 2: Room CAN 217

Moderated by:

Teresinha Prada and Danilo Rossetti

Intertextuality Networks for a New Composition: Articulations, Interrelationships, and Emergences through Listening

Caroline Wilkins

A Surge of (Un)-Intentional Sound: On Eavesdropping

Azadeh Nilchiani

The practice of listening to the city in Max Neuhaus's approach

Mélissa Mathieu

When museums increase listening: sound creation in the service of transmission

14:00 Panel 3: Room CAN 219

Moderated by: **João Dias Fernandes**

Ricardo Thomasi and Silvio Ferraz

Inhabiting traces: creative insights from experiments with artificial ecosystems

Jorge Sousa and Henrique Portovedo

'Post-digital' in contemporary music for saxophone, electronics and video

Henrique Portovedo

SCAMP Singularity 3A: Algorithmic Computer-Assisted Music as means of Multidimensional Performance and Creation

Stefano Catena

A functional approach to spatial musical analysis

16:00 Coffee Break

16:15 Panel 4: Room CAN 217

Moderated by: **João Pedro Cachopo**

Nicol Oddo

Rigoletto by Damiano Michieletto: a case study to understand the complex horizon of contemporary opera staging

Sara Pinheiro

Foley Gesture

Nicola Bizzo

The music of Queen: dynamic soundtracks and a new audiovisual relationship

16:15 **Panel 5: Room CAN 219**

Moderated by: **Paula Gomes Ribeiro**

Silvio Ferraz

Some remarks on musical energy: analytical approach from Iannis Xenakis' ST/4-1, 02061962

Leon Steidle

The modulation of perceptual states in Helmut Lachenmann's music

17:45 **Break**

18:00 **Happening: Fencing Room**

György Ligeti's centenary: Quasi a Symphonic poem (for 100 metronomes)

Thursday, 4 May
Morning

09:00 **Panel 6: Room CAN 217**

Moderated by: **Riccardo Wanke**

David Friedrich

Beyond Acoustics: The Impact of Cochlear Implants on Sound Perception

Julian Johnson

Musique, que me veux-tu? The challenge of music listening

Gustavo Penha

Solfège, becoming-voice and ear-voice machine in the analytic listening

10:30 **Coffee Break**

Parallel Sessions

10:45 **Panel 7: Room CAN 217**

Moderated by: **Makis Solomos**

Louisa Martin-Chevalier

The Various forms of Politization of Contemporary Ukrainian Musical Creation

Rita Santos

The collective consciousness, sound art, and festivals- an avant-garde insight

Maria Inês Pires

Connections between music programs, concert's spaces and audiences on
Drumming Grupo de Percussão activities

Marin Escande

Exploring the Japanese music scene of the 1960s from the perspective of kankyō
geijutsu (environment art)

10:45 Panel 8: Room CAN 219

Moderated by: **Filipa Magalhães**

Ângela da Ponte and Dimitris Andrikopoulos

Looking Back – Stepping Forward, Creation through the Spectrum of Tradition

Philippe Trovão and Henrique Portovedo

Recovery of analogue devices for live electronics: Case studies in recasting Korg
SE500

Renata Kambarova

Approaching Nola, Shashmaqom, and Western contemporary art music through
intercultural exchange and artistic research

Luís Neto da Costa and Henrique Portovedo

Orgias do agora's multiphonics: meaning and notation

12:45 Lunch

Afternoon

14:00 Panel 9: Room CAN 219

Moderated by: **Filipa Magalhães**

Monika Karwaszewska and Beata Oryl

The Metaphorical Sense of Artistic Discourse and its Inphrastic Narrative

Niki Zohdi

Proximities and collisions: the compositional process of occulta scientia siderum

João Coimbra, Henrique Portovedo and Sara Carvalho

A Gestural Interface for Real-Time Composition: concepts and implementation

15:30 Coffee Break

16:00 Round Table 1: Room CAN 217

Moderated by: **Makis Solomos**

Christine Esclapez, Silvio Ferraz, Azadeh Nilchiani & Riccardo Wanke

Round Table: Exploring the ecologies of music and sound. (Re)politisising musical listening

20:00 Concert

György Ligeti's centenary

21:00 Social Diner

**Friday, 5 May
Morning**

09:00 Panel 10: Room CAN 217

Moderated by: **Filipa Magalhães**

Joevan de Mattos Caitano

International Summer Courses for New Music in Darmstadt from the perspective of Brazilian composers, instrumentalists, musicologists, and conductors in the 21st century.

Nicholas Freer

Points of transition in John Coltrane's harmonic practice 1957-1960; Decoupling and repurposing telos in jazz harmonic organisation.

Roberto Oliveira-Ogando

Enrique X. Macías Collection: processes and results of the digitization of magnetic tape

10:3 Coffee Break

Parallel Sessions

10:45 Panel 11: Room CAN 217

Moderated by: **Azadeh Nilchiani**

João Ricardo

Music composition and data sonification practices in the creation of synthetic soundscapes

Gonçalo Gato

Composition: let's talk about listening, again

Nariá Ribeiro

Non beat-based rhythms in Xenakis' string quartet Tetras

Cláudio Pina

The acousmatic gesture in contemporary organ music

10:45 Panel 12: Room CAN 219

Moderated by: **Nuno Fonseca**

Carlos Villar-Taboada

Rodolfo Halffter's Capricho, op. 40 (1978), for solo violin: topics and twelve-tone technique

Kenrick Ho

Flou: A Co-compositional Attempt at Algorithmic Embodiment

Paula Gomes Ribeiro and André Malhado

(Un)listening to music: rethinking musical values in the age of the algorithms

12:45 Lunch

Afternoon

14:00 Round Table 2: Room CAN 217

Moderated by: **Isabel Pires and Louisa Martin-Chevalier**

Christine Esclapez, Luis Velasco-Pufleau, João Dias Fernandes, Makis Solomos, Rosalía Martínez

A Debate on Musicology, Mobilization, and the Archives in the Context of Filigrane Journal

15:30 Coffee Break

16:00 Keynote Speaker: Room CAN 217

Moderated by: **Isabel Pires**

Roger Cochini

Interactive Listening and Musical Creation

17:00 **Conference closing**

*Announcement of main subject to the 4rd NCMM edition to
take place in May 2025*

List of Contributions

Keynote Speakers

Mark Reybrouck.....	12
Roger Cochini.....	13

List of Abstracts

Ângela da Ponte and Dimitris Andrikopoulos.....	16
Azadeh Nilchiani.....	17
Carlos Villar-Taboada.....	18
Caroline Wilkins.....	19
Cláudio Pina.....	20
David Friedrich.....	21
Gonçalo Gato.....	23
Gustavo Penha.....	25
Henrique Portovedo.....	27
Isabel Pires, Louisa Martin-Chevalier with Christine Esclapez, Luis Velasco-Pufleau, João Dias Fernandes, Makis Solomos & Rosalía Martínez.....	29
João Coimbra, Henrique Portovedo and Sara Carvalho.....	30
João Ricardo.....	32
Joevan de Mattos Caitano.....	33
Jorge Sousa and Henrique Portovedo.....	35
Julian Johnson.....	37
Kenrick Ho.....	39
Leon Steidle.....	40
Louisa Martin-Chevalier.....	41
Luís Neto da Costa and Henrique Portovedo.....	43
Makis Solomos with Christine Esclapez, Silvio Ferraz, Azadeh Nilchiani & Riccardo Wanke.....	45
Maria Inês Pires.....	47
Marin Escande.....	49
Mélissa Mathieu.....	51
Monika Karwaszewska, Beata Oryl.....	53
Nariá Ribeiro.....	54
Nicholas Freer.....	56
Nicol Oddo.....	57
Nicola Bizzo.....	58
Niki Zohdi.....	60
Paal Fagerheim.....	61

Paula Gomes Ribeiro and André Malhado.....	62
Philippe Trovão and Henrique Portovedo.....	64
Piotr Kędziora.....	66
Renata Kambarova.....	67
Ricardo Thomasi and Silvio Ferraz.....	68
Rita Santos.....	70
Roberto Oliveira-Ogando.....	71
Sara Pinheiro.....	72
Silvio Ferraz.....	73
Stefano Catena.....	75
Teresinha Prada and Danilo Rossetti.....	76

Keynote Speakers



Mark Reybrouck
*KU Leuven, University of Leuven / Ghent
University, Belgium*

Music listening as exploratory behaviour. Conceptual issues and underlying mechanisms

The core tenet of this talk is an attempt to redefine music as part of the sonic universe and to naturalize musical epistemology by relying on the innate disposition of human beings to cope with their environmental world. It revolves around the ecological conception of interaction between an organism and its environment, substituting the listener for the organism, and music for the environment. It takes as a starting point a broad definition of music as a temporal and sounding art, considered in vibrational terms as transferable energy that impinges upon our body and our senses. A major aim is to provide a framework for musical sense-making that goes beyond traditional approaches of musical analysis, which rely on explanatory categories that are too narrow to embrace all kinds of music. What is argued for, on the contrary, is an approach that starts from a processual approach to music that redefines the musical experience in terms of exploratory behavior, leaning heavily on older contributions from pragmatic philosophers and ecological psychology as well as on several "turns" in more recent cognitive science. Special attention is given to the relation between music and sound, and the role of attention and ongoing knowledge construction, with a dynamic tension between four major dichotomies: the focal vs. synoptic overview of sounding music, the continuous vs. discrete processing of the sounds, the distinction between sensory experience and symbolic representation, and the real-time vs. outside of time processing of the music. The proposed framework brings together insights from converging but distinct disciplines, relying both on theoretical frameworks and empirical findings.



Roger Cochini
*Université Lille 3 || Ecole Nationale
Supérieure d'Art de Bourges, France*

Abstract

Is it important to take a musician in training back to the origins of music? That is, to the natural origins of humankind. The human being is sensorimotor, and thanks to their sensory system, they can perceive life and use it as a basis for projection, construction, and creation. Therefore, they are naturally predisposed to interactive listening, which has enabled people from all over the world to create music on every continent. Pierre Schaeffer conducted important research on interactive listening during his work on *musique concrète*. *Typo-Morphology* involves analyzing the characteristics, movements, relationships, and structures of sounds in simple and communicable terms. This enables one to fix ephemeral sounds in their mind. Once a human being recognizes their innate abilities, they begin to perceive, create, memorize, build relationships, play alone and with others, and experience pleasure through these activities. This form of listening is universal. The presentation will center around the fundamentals of pedagogy, with a particular focus on its applications in the teaching and creation of electroacoustic music for both children and composition students. Building upon these foundations, the following will be presented using sound and visual examples:

- A program of activities
- Pedagogical games that combine body movements and cognitive development
- Instruments that enable sound and musical creations
- Examples of children's sound creations and students' musical compositions, including electroacoustic and interdisciplinary music
- Supplementary texts to aid in independent discovery and practice of music
- The relationship between nature, human history, and the nature-culture dynamic
- A listening program for repertoire to be experienced both during and outside of music classes.

List of Abstracts

Looking back – stepping forward, creation through the spectrum of tradition

Throughout the history of occidental music, there have been many moments of reevaluation of the function of traditional music inside compositional practice. Nowadays, there is a great interest from composers of different countries to reinterpret the value of traditional music, its elements, the new sonic possibilities that can be developed using traditional instruments and the possibilities presented through the integration of all above into the contemporary music scene to serve composers aesthetic and expressive purposes. On the same moment it is important to question how this approach is made and which compositional parameters are developed and articulated. Nettl (2005) demonstrates the swampy terrain one can enter when dealing with traditional music and cross-cultural approaches, its validity and the moral questions that surge, especially when using materials of foreign origins. Nonetheless, we can trace traditional elements in major works from composers like Reich, Lim, Takemitsu or Rehnqvist. All these composers never took the easiest path to their compositional endeavors.

The authors of this proposal are interested into a similar type of approach, a respect of the traditional music origins, and the same time, an exploration on how these elements can create a new basis for music creation. This is addressed through the presentation and analysis of two works – “Concerto for violoncello and ensemble”, by Dimitris Andrikopoulos, a work that explores elements of Greek traditional music and “Sketches”, for viola da terra and ensemble, by Ângela da Ponte, a work that explores the Azorean traditional instrument within the contemporary music and ensemble context. Both works are based on a contemporary interpretation of elements coming out of older musical sources, a reevaluation of the technical resources of older instruments as well as the way that all above can be integrated with into new musical contexts, namely within contemporary music ensemble or in combination with new media (electroacoustic music).

Keywords: Traditional Music; Contemporary Music; Notation.

The practice of listening to the city in max neuhaus's approach

An urban sound installation with a concern to integrate the daily life has many common points with other forms of urban artistic expression. The background is the perpetually changing environment of the city. Furthermore, the way they are perceived and heard depends also on the acoustical and architectural configuration of their place. One of the specificities of these installations, audible but often invisible, is their territory, which is not only limited to their location. It is difficult to define the territory of these artworks, as the sound crosses the obstacles, unfolds in space and is mixed with the existing sounds of the place. The unexpected encounter between the urban sound installation and passers-by, could cause a shift in the way we listen to our environment, even though it's a familiar one. From 1966, the American artist Max Neuhaus moved away from his career as a percussionist to move towards sound art. The point of departure and arrival for each artwork by Max Neuhaus is listening. What interests Neuhaus is to shape the space with the sound, as a sculptor does with space. It is also a desire for him to communicate with new audiences in a new listening space, different from those of concert halls or museums. Based on the existing sound resources in urban settings, Neuhaus developed his very pioneering approach by revealing inaudible or barely audible sounds of various spaces. From his first performance such as *Listen* (1966-1976) or *Public Supply I* (1966), the public, the actor of his works, is invited to practice listening to the urban space and their environment to rediscover the sound dimension of their daily life. In this context, he invites his public to the field, the birthplace of these everyday sounds.

Our recommendation in this paper is to study how the listening that Neuhaus has developed through his performances and his urban installations is representative of its approach to social and urban practice, both individual and collective. For Neuhaus, the discovery of the complex sound dimension of the urban space and its perpetual changes is a training of the ear, but also, it is what provides the key to create and discover urban sound installations.

Keywords: Listening; Urban Sound Art; Social Practice.

Rodolfo Halffter's Capricho, Op. 40 (1978), for solo violin: topics and twelve-tone technique

The musical career of Rodolfo Halffter (1900-1987) is one of the most unique among the composers of his time. He is considered one of the main musicians of the Spanish "Group of the Eight", that, imitating the neoclassicist avant-gardism guided by Manuel de Falla (1876-1946), and close to the environment of the Generation of '27, transformed the conservative Spanish nationalism. Ideologically committed to the Second Spanish Republic, he was forced into exile after the Civil War (1936-1939). In Mexico, Halffter continued to expand his personal creative adventure, focusing in a very personal way on the research of new techniques for his adopted country: the twelve-tone method, advocated by Schoenberg and his disciples of the Second Viennese School. In fact, his pianistic *Tres hojas de álbum* (1953) was considered the first dodecaphonic composition both in Mexico and in Spain—despite Roberto Gerhard's previous pieces. Rodolfo Halffter developed an important teaching work for the new generations of Mexican composers and contributed to revitalize this cultural environment in favor of contemporary musical creation, supporting the creation of associations and institutions specialized in its dissemination. During that time, he produced an increasingly experimental oeuvre, favorably evaluated by critics despite the relatively shortage of his catalogue of works. One of its most frequent features consists of an almost constant identity debate between his different artistic references; those of Spanish nationalism, from a very personal perspective: he looked to the historical musical past of the Golden Centuries (16th to 18th Centuries), but also to the folkloristic traditions mainly of Andalusian flavor, and to the avant-garde represented by dodecaphony, musical expression of the lack of artistic prejudices in America. With this ability to integrate in a highly personal language, his dialogues with music of the past, the echoes of the various Spanish folkloric traditions and an original reading of the twelve-tone method, Halffter's inspiration created a short but very selective list of works, many of them for chamber groups and soloistic instruments. Among these compositions, *Capricho*, op. 40, for solo violin, is one of his later samples (1978) of the aforementioned: it reconciles a historical topic (the capriccio) tied to a freedom of approach, with the innovative bias of the twelve-tone method, taken since an unorthodox point of view. This paper consists of an analytical study that combines both Forte's Pitch-Class Set Theory and Perle's twelve-tone principles with Ratner's and Agawu's Topic Theory.

Keywords: Rodolfo Halffter (1900-1987); Twelve-Tone Music; Topic Theory.

Caroline Wilkins
Independent Composer/Performer/Researcher, UK;

A Surge of (Un-)Intentional Sound: On Eavesdropping

Flooded by the actual torrent of (mis-)information that washes over us constantly, contemporary society is faced with the problematic task of 'wringing out' its ears on submission to such an overload of sound in order to keep 'afloat'. During global reactions to Pandemic the 'rush on-line' substituted so much previously gained from live musical gatherings and individual life situations. Its consequences continue to this day with an enormous increase in streaming and other virtual / hybrid listening methods. In this presentation I shall briefly discuss four diverse contemporary projects on eavesdropping: two ongoing investigations, the first held under the same title, at the Ian Potter Museum of Art, Australia (2008), the second a practice research led by Rebecca Collins and Joanna Linsley entitled 'Stolen Voices' (2019). These are followed by 'Eavesdropping London', an artistic project founded by soprano Juliet Fraser in 2017 and finally an audio work 'With W/Ringing Ears' (2022) by sound artist Leona Jones and myself. Each develops artistic solutions envisaged within a framework of audio / visual installation, live encounters, websites, publications, network sharing or debate. Some raise awareness of the ethical and political problems of eavesdropping, others approach the subject within a more positive context of the term and its relation to artistic practice. Reference will be made to theoretical sources such as Roland Barthes' collected seminars entitled *How to Live Together*, *Novelistic Simulations of Some Everyday Spaces* (trans. Kate Briggs), Chichester, West Sussex (2013), Peter Szendy – *All Ears: The Aesthetics of Espionage*, Fordham University Press, (2017) and Siegfried Zielinski's *Deep Time of the Media* (2006), MIT Press, Cambridge, Mass. My aim in this paper is to examine critical ways of listening to today's music and sound within the context of an intrusive practice that saturates our very ears. In so doing I pose a fundamental question that concerns the relationship between a listener and what is heard.

Keywords: Contemporary Eavesdropping; Artistic Solutions; Ethics; Politics.

The acousmatic gesture in contemporary organ music

Since 1960, the most prolific period on organ experimentation, we find non-orthodox compositions on the organ. Composers like Hambraeus, Ligeti, Cage, Kagel and Xenakis, to name a few, changed the paradigm of organ composition with a specific goal in mind – the sound produced by these old instruments. From this collection of works, the ones from the protean composer Ligeti are paramount. From the graphical score of *Volumina*, the long clusters of Harmonies to the fast torrent of notes of *Coulée* we find carefully laid out performance notes of how to achieve these new sounds – unknown at the time. Today we can label these new sounds as extended techniques, like the ones found in other aerophones. Notwithstanding, the perception of the audience regarding these sounds behaves in a different way. They challenge the listener's mind. Where does these sounds come from? Is it a special register? Did the organ was altered in some way? Is there another contraption or instrument on the choir? Or even the odd commentary of: "Did the organ malfunction?". Since most organs are hidden from plain sight in a large reverberant space, the sound propagates in all directions, like a multichannel loudspeaker array. On top of that, the organs inhabit the choir, a higher balcony, and the audience faces the opposite direction. It is clear that we can apply Schaeffer and Chion listening modes to an organ recital with this kind of repertoire. Besides that, the usual audience expects a known body of sounds (i.e., Bach's organ works) and struggles to identify the source and how they are made. In this regard, Annette Vande Gorne classifies Ligeti's organ works has clear examples of acousmatic music.

Keywords: Organ; Contemporary Music; Acousmatic Music; Reduced Listening; Audience Perception; Extended Techniques.

David Friedrich

University of Western Australia (Conservatorium of Music), Australia

Beyond acoustics: the Impact of Cochlear Implants on Sound Perception

The human sensory apparatus has changed with implanted media technologies. One of these technologies is the hearing device cochlear implant (CI). It enables users to perceive an environment of signals beyond acoustics; an audible perception of electromagnetic fields that have only occurred in non-human organisms and machines. Nonetheless, most discourses about the CI focus either on implantation, and post-operative treatment, or criticise the media-political power of the wearable speech processor (WSP) on the outside of the head, i.e., asking who determines the quality of hearing. Whereas culture defines the quality of hearing, it is overlooked that sound waves determine the sense of hearing. However, this stands in contrast to the actual sensation via the implanted part of the CI: The implanted neurotechnology bypasses the mechanical parts of the ear via an ensemble of radio and computer technology to stimulate the nerve fibres in the cochlea directly. Through a transcutaneous radio link without physical connection, the implanted part receives energy for powering the implant and spatio-temporal information for orchestrating the stimulation in the cochlea via electrodes from an external wearable speech processor. Based on a techno-philosophical investigation, the relationship between techno-biological sensation and sound perception will be explored by opening the black-box of the implanted receiver and stimulator, which are actually responsible for hearing. The exploration of this human-machine symbiosis is used as a case study to rethink the sense of hearing, which is no longer determined by mechanical sound waves because the implanted receiver only receives electromagnetic signals—no matter whether the signal comes from the WSP, an MRI, or from a mobile phone. While there are studies on the perception of sound and the mechanisms of hearing, there is a lack of examination focusing on the relationship between our understanding of sound and the sense of hearing provoked by an altered sensory apparatus, such as in the human-machine symbiosis mentioned. At the NOVA Contemporary Music Meeting, David will address how CI users perceive sound via their implanted radio and computer technology. The aim of the presentation is to discuss whether the sense of hearing is based on the perception of sound waves and how problematic this entangled relationship is regarding the definition of hearing. Based on a cross-disciplinary approach, David would like to discuss why the sensation of hearing via CI affects not only the perception of sound but also how our understanding of sound recursively affects sensation.

Keywords: Cochlear Implant; Sense Of Hearing; Auditory Perception.

Composition: let's talk about listening, again

To talk about listening in music is to talk about music itself. Despite this generality, specific knowledge is still building up as we study the perceptive and cognitive processes involved. This is not to say that there aren't aspects of music not tied to listening, (e.g., pure score engraving). Plus, it is certainly possible to compose a piece without hearing a single sound. The opposite scenario is, nevertheless, the most common and natural, and developing listening skills is the main aim of musical training. Composers work with sound, which requires a source and a listener to be experienced. This duality gives rise to two general corollary questions. What sound sources do composers use while composing and how do they differ? How can music listening be characterized and what aspects stand out as most relevant? This paper attempts at giving a contribution towards answering both questions from the viewpoint of compositional practice. A first subtopic relies on the fact that the act of composition defines a moment, and in relation to that moment there are three different times: before, while and after. Listening while composing is the most specialized, whereas before and after may share characteristics. How can these times be characterized and what are their implications?

A second subtopic concerns sound listening modes. These have been previously addressed by some authors, namely Schaeffer, Truax and Chion. Are there further and specific music listening modes and do they apply to musical composition? How? What further listening modes can be identified and/or theorized? Regarding musical elements such as harmony: can we theorize ways of listening? Are there different ways of listening and conceiving chords and chord progressions? For instance, chords can work as harmonic functions, as interval sets, or as timbres. A third subtopic concerns the way we approach new music. It is generally accepted that listening has gone through changes throughout music history, an evolutionary idea captured by Schönberg in his emancipation of dissonance: the ear gradually becomes accustomed to intervals which no longer need to be prepared and resolved. But can we further develop the idea of listening adaptation to different aesthetic propositions in contemporary music, not just connected to dissonance? What kinds of perceptual emancipations can we theorize for today's music? What changes occur in listening as we approach music that does not work in a way we're used to? A fourth and final subtopic concerns a particularly interesting and paradoxical aspect of music making and music listening that needs further exploration: what we can call the unheard. What can exist in music that is not heard, and what is its role in composition? A striking example of an unheard element of

music is pulse: it is usually implied, inferred by the brain and felt by the body. But many times, composers deal with other unheard aspects, which can either be non-musical — numbers, schemes, structures, etc. — or musical, such as an intentional compositional action of not hearing, or of purposefully leaving space for indeterminate performative actions during a concert. Are unheard phenomena an internal, calculation-based listening mode?

Keywords: Composition; Listening; Listening Modes; Musical Perception; Musical Cognition.

Solfege, becoming-voice and ear-voice machine in the analytic listening

One can think about the concept of solfege far from its habitual conceptions, which is understood as a decoding process of information written in a musical score as well as a discipline from the formal music education systems. In a larger view, one may also see solfege as a filter or an operator in the musical listening, which selects some expressive lines from sound and musical objects. The construction of this capacity of selection is very gradual during musical learning and practicing. In the auditory listening, this selection process is directly related to a singular and subtle connection between ear and voice, in which the voice is activated, as an instrument with its own “keys”, as soon as a sound signal turns into a perceptive-auditory signal in the listening process. Then, when its “keys” are activated by the ear, the vocal instrument selects and captures some expressive lines from the sound signal, according to the listening capacities and the actual motivations of the listener. According to the French musicologist Gisèle Brelet, the voice is on the origin of the sound: “the voice released and truly created the sound by pulling it out of the things”

Brelet also affirms that “the musical gesture, by excellence, is the vocal gesture.” By making this provocative affirmation, Brelet distinguishes: the vocal gesture, related to a certain dynamic configuration, actual or virtual, of the phonatory system; the instrumentalist and singer body gesture, related to their motion and acting during a performance; and the melodic gesture, related to the curves and contours of a melodic line. The vocal gesture is implied both in body and melodic gestures, and “escapes from all visible manifestation: it is just translated by sounds.”

Thus, these Biran’s and Brelet’s proposals establish an interesting possibility: the thought that the analytic-musical listening depends on an inseparable accomplishment between voice and ear. In other words, the expressive line selection occurs by linking the phonatory and auditory systems in a zone of indiscernibility. It is as if all sounds that reach the ear, yet to be analyzed, pass to a vocal filter that repeats, in an interval, some aspects of the listened sound and make it possible, thereby, the selection and certain measurements of some expressive sound lines. This vocal activity works in the listening process as the “petites perceptions” which is derived from the conscious perceptions. As “petites perceptions”, or “unconscious perceptions”, the vocal effort implied in the auditory listening works as “invisible presences that make other presences ready to signify”. This process works as a becoming, a double capture (DELEUZE, GUATTARI,

1987[1980]), by which the ear becomes voice and the voice becomes ear, expanding themselves and opening, by experimentation, new and unpredictable modes of actuation. This paper seeks to raise some practical problems for researching, learning and practicing music, which is derived from the continuous and infinitely creative operation of this ear-voice machine in musical listening.

Keywords: Solfege; Ear-voice; Listening.

SCAMP Singularity 3A: Algorithmic Computer-Assisted Music as means of Multidimensional Performance and Creation

The intertwining of computation with artistic environments leads to a state of permanent articulation and supports the development of artistic creation. We are immersed in computation, living in a post- humanistic and post-digital world, in which it becomes fundamental to artistic practice, to artworks, and the aesthetic experience. The integration of digital technology and mechanical instruments would not only deconstruct this distinction between electronic and instrumental music, enormously amplify the scope of extended and augmented techniques, but would also question, the traditional understanding of composer, performer and programmer, and their interrelationships. In cases in which the composer and programmer are distinct members of the creative process, insofar as coding affects the compositional options, authorship is deconstructed inasmuch as it does not result from a single mind. Although instrumental music is by definition technologically mediated, digitalization has fundamentally changed music production, transmission, and reception, in ways perhaps not fully foreseeable at its origins. The work SCAMP Singularity 3A is presented here as belonging to a group of works, Slippery Singularity Studies, composed from two algorithmic computer systems for electronics and multiple saxophones, namely SCAMP and Slippery Chicken. The first pieces were developed over the specialised algorithmic composition software named Slippery Chicken developed by Michael Edwards, written in and functions on the principles of the Common Lisp Object System (CLOS), the Common Lisp facility for object-oriented programming. SCAMP Singularity 3A for Baritone Saxophone and four speaker was developed over SCAMP framework in Python, created by Marc Evanstein, designated to act as a hub connecting the composer-programmer- performer to different resources for playback and notation. The structure and spatialization of the piece is based on data sonification thru the reading of CSV files using the pandas library for data wrangling. Technology is moving faster than musical practices and we are taking some snapshots of techniques applied in musical composition and performance, techniques whose materialities will be quickly replaced with new ones, but whose embodied structures continue and become re-implemented in later technical objects as a recycling of skills. Understanding how emerging digital musical technologies trace their concepts, design and functionality to practices in the current cultural epoch will bring to light a study of new- media archeology, conceptual epistles and performative paradigms, directed, in other words, to the study of how the new technologies of mixed music-making trace their

design to the practices of material, symbolic, signal inscription, listening experiences and how practice is transforming and leading to creation.

Keywords: Algorithmic Composition; Saxophone; Mixes Music; Immersive Listening.

Isabel Pires, Louisa Martin-Chevalier with Christine
Esclapez, Luis Velasco-Pufleau, João Dias Fernandes,
Makis Solomos & Rosalía Martínez

^[IP]CESEM — FCSH, NOVA University of Lisbon, Portugal; ^[LMC]Sorbonne
University, France; ^[CE]PRISM / CNRS, Université Aix-Marseille, France;
^[LVP]Bern University, Switzerland; ^[MS]MUSIDANSE, Université Paris 8,
France; ^[RM]Centre for Research in Ethnomusicology, LESC, CNRS,
France;

Round Table: A Debate on Musicology, Mobilization, and the Archives in the Context of Filigrane Journal

Filigrane is a musicological journal which, while interested in situated practices, is also oriented towards an epistemology of creative and research practices in order to explore the relationship that the arts maintain with their multiple environments, which participate in the elaboration of their meaning. Filigrane sees critical research as a means of empowering individual and collective subjects, and a revaluation of the common. To promote an in-depth discussion, the upcoming roundtable will center around the main themes of the next two issues: the role of mobilization in musicology and the use of archives in creative musical practice.

Keywords: Filigrane Journal; Music And Mobilization; Music And Archives.

A Gestural Interface for Real-Time Composition: concepts and implementation

The use of the studio as a composition process using acoustic, analog, and digital instruments have been the basis of my artistic practice. This process promotes the interaction for different elements that make up the studio to favor composition through timbre as musical material. The way I've been using my studio has suffered constraints due to my need to add new sound materials for my composition. This Ph.D. project aims to answer this problem by constructing and mapping a digital musical instrument that uses gestures to produce sound. The Physical Computing Instrument (PCI) will restructure my composition process, adding new materials to the studio, while maintaining the use of the current ones. As a composer who uses performance as a procedure for real-time composition, gestural expressiveness is key when thinking about the creation of a musical instrument. Bodiless instruments are great examples of timbre generators but with no direct correlation between physical gesture and sound, as it happens for instance with acoustic instruments. To this project, the definition of a Digital Musical Instrument (DMI) it's constricted to a musical instrument with a sound generator, detached from its control interface, and with musical and control parameters related to mapping implementation. Technological context makes it easier for composers and performers to develop their instruments and systems designed for a given musical context, meaning different ensembles, an interactive installation, or software-based work. However, these endless possibilities are also constraints since they offer infinite possibilities. Having this in mind, and as a research path, I adopted a strategy of design constraints, through mapping, hardware implementation, and idiomatic writing, to create the Physical Computing Instrument. Six pieces will be composed and performed to help build its final design. At the NCMM conference, I will be presenting compositional sketches to illustrate how these concepts will contribute to the implementation of the PCI. I also aim to demonstrate how the PCI may be useful for the growing community of musicians, composers, and academics who carry out research in this area, and for those not familiar with technology but eager to expand their artistic practice – experimenting with an instrument that will have a soft learning curve, will be portable, and that could be used to 'augment' an existing instrument. This project will also promote the sustainability of materials used in the PCI's construction, and through the implementation of technical solutions, that will contribute to making the instrument a self-sufficient device, in terms of its energy consumption.

Keywords: Gestural Interface; Digital Musical Instrument; Human-Computer Interaction.

Music composition and data sonification practices in the creation of synthetic soundscapes

The academic and artistic circles surrounding sonification have been getting more attention each day, with some semi-viral examples in which one can listen to the «sound of genes» (TEMPLE, 2017) or the «sound of the sun» (ATKINSON & SOSBY 2022). Following a collection and sampling of empirical data from various fields, the creation of sound objects to convey information turns practical and viable, as well as evident and accessible; objects which are but the consequence of random connections with musical vocabulary such as pitch, rhythm, timbre, etc. Composer and researcher Carla Scaletti (2018) states that sonification isn't music, but music is sonification. Following that argument, this paper aims for a creative communion of both sides of that assertion, proposing to create music that is sonification and sonification that is music. The first stage of this research settles within base categories and concepts regarding soundscape and acoustic ecology practices (KRAUSE 2012): Biophony (sounds generated by organisms), Geophony (non-biological sounds such as the wind, rain, etc.) and Anthropophony (human originated sounds). However, this paper won't dwell on events inscribed beforehand in these categories. Instead, the goal is to work on data material – and subsequent sonification – whose results may fit in one of the groups mentioned above, closer to a sympathetic link. For example, considering a sound object achieved through sonification and music composition practices from data pertaining the gradual extinction of a specific species as connected to Biophony, the weather conditions or population increase and decrease in a specific site and timeframe suitable for Geophony and Anthropophony respectively, among many other possibilities. In light of the three sound classifications above, the goal is to explore and report the creative results from the combination of the emergent methodologies associated with data sonification and more traditional techniques and practices analogous to music composition. In conclusion, this research aims to display the transmutation of raw “landscape” data into intrinsically musical associations and specifications such as the mentioned pitches or rhythms, but also exploring other possibilities like intervals, micro and macrostructures, etc., while taking into consideration the main consequence of these endeavors: the creation of – despite an underlying program close to a synthetic soundscape – self-standing musical pieces.

Keywords: Composition; Sonification; Soundscapes.

Joevan de Mattos Caitano
Evangelical-Lutheran Church of Saxony, Germany

International Summer Courses for New Music in Darmstadt from the perspective of Brazilian composers, instrumentalists, musicologists, and conductors in the 21st century

The Internationale Ferienkurse für Neue Musik in Darmstadt, founded in 1946 by the musicologist and journalist Wolfgang Steinecke (1910-1961), attracted participants from all over the world, including Brazil. Despite this productive interaction with other continents, the South Americans' participation was overlooked for many years in the major publications that concentrated on the relationship between Darmstadt and Central Europe. The Brazilian delegates who attended Darmstadt from 1949 to 1996 are remembered in the IMD Archiv, which is housed in the Internationales Musikinstitut Darmstadt. Their legacy has already been investigated and is scheduled to be published in 2023. Some Brazilians have participated and contributed with their pieces in concerts to the Darmstadt summer courses in the twenty-first century, including Mauricio De Bonnis (Ferienkurse 2000), Pedro Bittencourt (2004), Filipe Ribeiro (2008), Bruno Ruviano (2008, 2010), Felipe Lara, Daniel Moreira, Daniel Puig (2010), Arthur Kampela (2012), Valéria Bonafé, André De Cillo, Eric Moreira, Gustavo Oliveira Alfaix (2014), Marcela Lucatelli, Marcos Balter, and Ricardo Eizirik (2016). With Solf Schäfer's leadership, Darmstadt was able to host new music performances outside of traditional places between 1996 and 2008. Saxophonist Pedro Bittencourt, who has led the Abstrai Ensemble in Rio de Janeiro and been a superb promoter of avant-garde music, was given scholarships by the IMD director. The Open Space, created by director Thomas Schäfer in 2010, has been a key element of the summer course program, serving as a sort of "marginal festival" where Brazilians and participants from other nations can interact, transfer knowledge, as well as share ideas and create performances. According to the overview of New Music in Darmstadt, Brazilian compositions were performed at concerts there between 2000 and 2018. During the Darmstädter Ferienkurse 2008, Felipe Lara was the winner of the Staubach prize, when his work "Tran(slate). Second string quartet" was performed. This article aims to convey a variety of points of view regarding Darmstadt from the testimony of Brazilian composers, instrumentalists, and musicologists of the new generation based on materials acquired in the IMD Archiv, interviews with the stated persons, and specialized literature. The content aims to respond to the following major inquiries: What effect did Darmstadt have on each Brazilian's career? What connections can be drawn between Brazilian Contemporary Music and the Darmstädter Ferienkurse? What distinctions exist in the Brazilian

participants in Darmstadt's compositional works? In Darmstadt, what activities did these Brazilians develop? What initiatives did these Brazilians start to promote contemporary music in Brazil and abroad? The discussion of these issues will broaden the historical repository of the Darmstädter Ferienkurse Kursen für Neue Musik, providing new avenues for research concerning other Latin Americans who attended Darmstadt in the first two decades of the twenty-first century, prior to the pandemic.

Keywords: Darmstadt; Neue Musik; IMD Archiv; Brazilian Composers; Brazilian Contemporary Music

Jorge Sousa and Henrique Portovedo

^[JS]University of Aveiro, Portugal; ^[HP]INET-md — University of Aveiro,
Portugal

‘Post-Digital’ in Contemporary Music for saxophone, electronics and video

We live immersed in a digital world and for this reason, seeking for a distinction between the digital and the non-digital becomes increasingly blurred. The term post-digital emerges from this reality of immersion in digital technology. Coined by Kim Cascone in 2000, the concept has evolved, from a moment of disenchantment and loss of fascination with the digital and the exploitation of the flaws arising from the use of technology. The post-digital aesthetics reveals itself in a concern for the development of the digital world, of software and hardware, since this development presents itself as a necessary premise today, crossing it with the non-digital world, the physical world, embracing what belongs to both domains. Consequently, this hybridization has enabled the emergence of new performance practices that use musical systems in unorthodox ways, where the starting point is not the concern with an evident distinction between digital and analogue, but rather a scrutiny of the omnipresent impact of digital media in our daily lives. As a “catalytic agent” of contemporary music creation, post-digital aesthetics is present in music for saxophone. The interaction between technology – saxophone – performer fascinates several contemporary composers and it represents a framework to be watched through the surrounding post digital culture. The aim of this paper is to highlight the main characteristics of post-digital aesthetics, in relation to the composer’s general intentions and/or technical and aesthetic motivations, in three contemporary works written for saxophone in interaction with electronic media. The selected works are: *Second Study for Alto Saxophone, Electronics, and Video: pulp* by the American composer Jason Buchanan; *Somnambulicq* (alto saxophone, electronics and video) by the Russian composer Alexander Khubeev; *POV* (for soprano saxophone, VR glasses, video and electronics) by the Spanish composer Óscar Escudero. In order to collect data, semi-structured interviews were applied to each of the composers. As part of artistic research, from qualitative research angle, interviews are useful tools for obtaining in-depth data on the motivations and procedures made by different persons.

The results of this study reveal more significant traces of post-digital culture in the aesthetic and technical design of the works, as the composers assume to feel immersed in a digital culture, which influences and guides their thoughts as creators. For them, the intersection between music and digital technology allows to meet a certain

“unpredictability”, as well as to make the fusion music-technology-live performance a “poetic analogy” for our daily existence with computers. The unified relationship between image and audio, made possible by technology, provides an immersive environment. The post-digital music detailed here seeks in the relationship between the previously created elements (audio and video) and the live generated material an increase of the range of artistic possibilities, enabling a mutual interaction, hardly “repeated”. Although undertheorized, post-digital aesthetics has an obvious impact on our contemporary culture. Therefore, the selected works concern to the “neo-analog and hybrid digital/analog media designs” related to this aesthetic.

Keywords: Post-digital; Contemporary Music; Saxophone.

Musique, que me veux-tu? The challenge of music listening

Recent decades have seen a striking expansion of research into music listening across many disciplines (from neuroscience and psychology, to education, sociology and philosophy). While these approaches imply a diversity of methodology, they are all shaped by a common assumption: the centrality of a self-identical listening subject. Empirical and theoretical studies alike not only start from, but also reproduce and reinforce, a model of the listening subject that is the legacy of a Humanist Modernity. Unsurprisingly, studies of the function of music listening tend to confirm it is mainly individualistic, self-referring, and solipsistic, and that most listeners are concerned with music as a tool of self rather than social relatedness. My paper takes an opposite approach in exploring a more critical theory of music listening. It takes seriously the idea that music and music listening challenge the explanatory discourses we bring to it. Rather than allowing music to be reduced to a mute object of discourse, I therefore explore what happens if we accord priority to the particularity of musical experience. I begin with the idea of aesthetic attentiveness – a mode of opening to the world defined precisely by a suspension of the rush to discursive articulation or explanation. Normative theories of music listening are predicated on the idea of consumption, a model derived from a capitalist comportment towards the world (the world as material to use to my ends). This mode of attention is neither a necessary condition of music nor music listening; indeed, it is the antithesis of what makes music listening a distinctive human activity. Nowhere is this clearer than in musical practices that refuse the equation of consumer choices with the exercise of an autonomous and critical subjectivity. I take the category of 'new music' to be a paradigm of such a refusal and the listening it affords as a resistance to a capitalist mode of comportment. My paper therefore considers music listening as exemplary of a different comportment. It explores music neither as a practice of meaning or communication, nor in terms of personal pleasure, identity formation or consumer habits, all of which refer music listening back to the sovereignty of an atomistic subject. Instead, it considers listening as aesthetic attentiveness, a mode of creative, embodied, non-discursive sense-making that does not subsume particularity but opens out to the world. Such an ecological attitude joins up with the emphasis of posthumanist aesthetics on exceeding the boundaries of a closed subjectivity. I explore this through examples of new music from Scelsi and Sciarrino to electronica and glitch, though my argument is not repertoire specific and might be applied to all sorts of music. I conclude by drawing out the critical social potential of music listening understood as aesthetic attentiveness rather than in terms of instrumental functions of private or social life.

Paradoxically, I contend that such a practice of music listening is today one of the most critical, pro-social and vitally important of all the many affordances of music.

Keywords: Aesthetic Attentiveness; Comportment; Posthumanism.

Flou: a co-compositional attempt at algorithmic embodiment

Flou for solo violin is an attempt at composer-performer co-composition to embody otherwise unidiomatic machine-learning generated materials. To explain the compositional problem at hand, this presentation draws on three ways contemporary composers have typically used algorithms to reveal a long-standing issue where composers are often faced with tensions between 'what the algorithm wants to produce', 'what the composer wants to write', and 'what the performer wants to play'. Upon scrutinizing musical examples by Boulez, Cage and Xenakis, I observed that these tensions can be resolved by enabling different kinds and levels of agencies anywhere within the relationship between the composer, performer, and the algorithm. For example, Boulez allows himself in limited ways to deviate from his algorithm to follow his compositional instincts, Cage creates predetermined open scores for performers to interpret, and Xenakis designs less autonomous algorithms to allow himself to use the algorithmic outcome without acting against it. In relation to this three-way tension, Flou takes inspiration from all three approaches above to allow the composer and performer to co-create the piece without deviating against the generated results. The composer interprets the given materials without intervening with pitch, by engraving a semi-indeterminate score that asks for an octave-lower scordatura on the violin. The performer's role is then to work out how to perform these notes under the influence of such unstable scordatura. The sounding outcome obscures the original algorithmic output, but in return, the bodily presence of the performer is foregrounded in their attempt to present the algorithmic outcome under the scordatura 'challenge' imposed by the composer. Overall, this piece is placed uniquely within the tension between composers, performer, and the algorithm, and it presents an angle to reflect on the creative relationship between humans and machines, demonstrating the creative opportunities that may emerge in the conversation.

Keywords: Algorithmic Composition; AI Embodiment; Phenomenology; Experimental Music; Physicality of performance.

Leon Steidle
University of São Paulo, Brazil

The modulation of perceptual states in Helmut Lachenmann's music

The following work aims to investigate a possible dynamization between perceptive states based on avant-garde music of the 20th century, considering acoustic and historical aspects, and having the work of the German composer Helmut Lachenmann as a model. For this, it was seen as necessary at first to establish a comparison between divergent thoughts about the relations of unity and duality between form and content in the musical field. On the one hand, we will expose the thought of the German philosopher Theodor Adorno and his historical-dialectic consideration together with the duality between form and content. In opposition to this, we seek to expose the philosophy of the French current illustrated by Deleuze and Lyotard, in which there is unity between form and content. The study aims to synthesize a logical model of modulation between perceptual states considered divergent through the energetic and allagmatic principles established by the French philosopher Gilbert Simondon, understanding that Lachenmann's work used here as a model in addition to his theoretical writings, enable these different approaches and such dynamics between perceptual states.

Keywords: Alagmatic; Musical Perception; Helmut Lachenmann.

The various forms of politization of contemporary Ukrainian musical creation

In this paper, I will propose a reflection on the links between artistic contemporary creation and the tragic situation of Ukrainian exile. Exiled director Vlad Troitskyi sees the stage as a space of resistance and he uses theatre as well as music to give an account of the war. Nova Opera – the collective that he founded in 2014 – is a group of young Ukrainian artists working together to develop new creative practices. Their experimental performances are designed as works 'devoid of aesthetic borders, freely joining avant-garde, rock, Gregorian chant, trip-hop, new baroque and traditional improvisation together'. The female collective Dakh Daughters – made up of seven women claiming to be political activists – explores the potential of underground theatre mixed up with electroacoustic as well as baroque music and traditional songs as a way to 'resist with humour [...] it is one of our weapons'. Like Iryna Kyshliaruk who says that she 'will fight with her music', I will investigate whether female musicians see their music as political and, if so, in what ways. Do they make use of texts to give an account of the geopolitical developments? A preliminary survey of the works composed by female Ukrainian composers in exile reveals a specific use of electroacoustic means: the 2022 season of the Festival of Ukrainian Contemporary Music has offered a 'journey through ancient Ukrainian landscapes, the mythologies of nature and centuries of agrarian life, up to the modern city. From forests to fields via the urban jungle, explore the various Ukrainian landscapes while contemplating on the role of music in the past, present and future of our planet' through the performances of works such as *Forest Songs*, *In the Field*, or *Anthropocene*. Moreover, the recent creations of young Ukrainian female composers (as Anna Arkushyna and Yana Shliabantska, in exile in Paris) seem to display a particular interest in the themes of acoustic environment. Indeed, the participation of women among the young generation of Ukrainian composers making use of electroacoustic means appears a lot more significant than in other areas. Is there a connection between ecological concerns and feminist claims? Do the female composers that this project involves claim a connection with nature that has socio-political aspects to it? This commitment to the environment could be reconsidered as a paradigmatic element of ecofeminism: 'the constant reference to the mother goddess in pre-modern societies allows us to confront the industrial and technological domination whose codes follow a patriarchal pattern, and oppose other types of relations and cooperation between humans and non-humans to it'. My paper will be illustrated by sound extracts from the

recent creations of the concerned composers, as well as from interviews given in the coming weeks.

Keywords: Contemporary Ukrainian; Musical Creation; Gender Issues; Music And Exile.

Luís Neto da Costa and Henrique Portovedo
*[LND C]Independent Researcher [HP]INET-md — University of Aveiro,
Portugal*

ORGIAS DO AGORA's multiphonics: meaning and notation

Since the second half of the 20th century, there has been an outbreak in the use of non-traditional techniques for acoustic instruments while composers searched for new timbres, challenging instrumentalists. Other paths besides pitch-oriented thinking have emerged, influencing and permeabilizing new values to the academic environment. Books about the so-called extended techniques have proliferated, means of cataloguing sound experiments and the composer-performer relationship has been constantly deepened and highlighted in the field of new music. Multiphonics are one of the commonest elements in the writing for woodwinds. While Analysis is still taking the first steps on these sounds, this technique has been generally treated as a distorted and noisy element, a peak after accumulation of tension, a harmonic brilliance, a static resonance, among others. *Orgias do agora* for baritone saxophone and electronics was influenced by *tara* and *q'iwa*, two contrasting tone qualities, performed in *pinkillu* duct flutes, an indigenous instrument from Bolivian Andes. Contrary to the classical music philosophy, *tara*, the equivalent to a multiphonic, has a positive aesthetic, and *q'iwa*, a single sound associated with weeping, a negative one. This concept led the author to compose the piece constituted by 90 % of multiphonics. Here this technique is not an exotic feature, but the constitution of its main language, only counterposed by muffled sonorities (as disrupted sounds). This sonority turned out to be a negative image, a total inversion, of delicate-sounding tradition found on most western music. During the compositional process, multiphonics were sorted by visual principles and pivotal fingerings based on a numerical sequence from the twin prime series that defines their choice, generating accidental tone relationships. Whereas some of them are repeated, the avoidance of rhythmic regularity obscures any centrality around a multiphonic while patterns are mainly formed by tone pedals and the reiteration of harmonies in the electronics. *tara* is a local and unknown philosophy to those who listened to the piece. In a globalised world, *Orgias do agora* frustrates listeners' expectations, it provokes them. Some compositional choices disregard auditory perception and do not consider any pursuit for consonant moments. Several questions about the relationship between the composer and the audience are raised and discussed, at the same time as noise is used metaphorically as an element of another world or an unwanted one. Pointing this out and summing up, Luís Neto da Costa and Henrique Portovedo catalogued more than 100 multiphonics for this piece. Their collaboration, interpretation issues and concerns about the notation of multiphonics are also addressed here. The multiphonic catalogue uses

grey scaling to differentiate weaker and stronger pitches within the spectrum whilst the score has rhythm and fingerings as an extended tablature. For this purpose, two applications were created and developed based on libraries Zsa.Descriptors and bach for Max software.

Keywords: Multiphonics; Saxophone; Programming.

Makis Solomos with Christine Esclapez, Silvio Ferraz,
Azadeh Nilchiani & Riccardo Wanke

^[MS]MUSIDANSE, Université Paris 8, France; ^[CE]PRISM / CNRS,
Université Aix-Marseille, France; ^[AN]Gustave Eiffel University, France;
^[SF]University of São Paulo, Brazil; ^[RW]CESEM, FCSH-Nova, Lisbon

Round Table: Exploring the Ecologies of Music and Sound. (Re)Politising Musical Listening_Proposal for a round table discussion

This is a proposal for a roundtable discussion on Makis Solomos' book that will be published in March 2023: *Exploring the Ecologies of Music. Environmental, Mental and Social Ecologies in Music, Sound Art and Artivisms*, Routledge. The round table will last 1h30 and will include people that will present papers at the NCMM23. Extract from the introduction of Chapter 6, "Listening as a Construction of the Commons": In his book *The World Beyond Your Head*, Matthew Crawford (2014) defines attention – the faculty that links us to the world – as a 'common good', just like the air we breathe or the water we drink. Here, we will focus on one particular form of attention – listening – and on one especially refined form of listening: musical listening. We will propose the theory that musical listening could be seen as a construction of the commons. Recent musical history can be read as a history of listening and its various mutations. Whether it is with the 'acousmatic' practices of *musique concrète* (F. Bayle, 1993), John Cage's experiments with the anechoic chamber (J. Cage, 1961), composition based on the 'idiosyncrasies of perception' by Jean-Claude Risset (1988), Luigi Nono's 'tragedy of listening' (L. Nono, 1993), Helmut Lachenmann's 'defenceless listening' (H. Lachenmann, 1991), Glenn Gould's listening through technology (G. Gould, 1966), Pauline Oliveros' 'deep listening' (P. Oliveros, 2005), the 'signed listening' project carried out by the IRCAM (APM, undated), or Francisco López's 'blind listening' (F. López, 1997), musicians and theorists have often returned to a focus on listening (cf. M. Solomos, 2020: Chapter 3). Within these explorations of musical listening, several trends question the classical model that culminated in Romanticism and lasted through modernity. The classical model runs thus: the subject and the object of its listening, the musical work and sound, are somehow detached from the world, and the world plays itself out within them. The work becomes a universe, and, by analogy, animates the world's conflicts and promises that they will be resolved in a kind of utopia. Hegelian idealism was the basis of this conception of musical listening, which was then magnified by Adorno's philosophy of music, especially the theory of 'structural listening' (cf. T. W.

Adorno, 1962: Chapter 1). This conception of listening is a wonderful way of exploring music's capacity to move people; however, focusing as it does on subjectivity conceived as pure interiority, and suggesting that everything occurs within 'music itself', it tends to place musical processes within the sphere of the personal. Critiquing the theory of the autonomy of music, Hildegard Westerkamp writes: 'the Western aesthetic separates the experience of music from its social context. When one is moved by the music in that sense, one is moved internally, privately, as an individual' (H. Westerkamp, 1988: 71). This conception of listening depoliticizes music. When employed in today's societies, in which common space tends to be increasingly lacking, it risks becoming the opposite of what it should be: instead of emancipating the individual, music risks becoming an instrument of control. The aim of several movements that question the classical model is surely to repoliticise listening by re-introducing it into common space. Without abandoning the impact of interiority, listening opens itself up to the world – to a world that has not been sifted by its analogical representation through the work.

Keywords: Listening; Commons; Politics.

The concerts of *Drumming Grupo de Percussão*: musical repertoire and venues

Drumming Grupo de Percussão is a percussion group based in Oporto (Portugal) directed by the percussionist Miquel Bernat. The group formed in 1999 and dedicates itself to a large repertoire of contemporary music organized into specific programmes. There are programmes of 20th century classical percussion music, including pieces by Steve Reich, John Cage and Iannis Xenakis. The group also performs ethnographic music. For example, Drumming created a timbila orchestra to perform music from the Mozambican oral tradition in programmes like “Estou-(me) a Marimbar” and “Tradicional versus Actual”. Some programmes have aimed to rethink musical material from pop, rock, bossa nova, flamenco and fado, like “Rock Metamorfose” and “Hard Club”. Drumming also created the first steel drum band in the Iberian Peninsula, which has performed programmes such as “Drumming Metalizado” and “Steel Drum... still Drumming”. Electronics are also used to extend the capabilities of acoustic percussion instruments and create new sonorities, as can be seen in the programme “Algo-Ritmos”. Finally, Drumming presents programmes with pedagogical content, like “Sincro” and “Drumming Móvil” which are aimed at younger audiences. Reflecting the diversity of their music programming, Drumming concerts take place in different contexts and places. For example, the group performs in concert halls like Casa da Música and Centro Cultural de Belém (Portugal), Zentrum für Kunst und Medien (Germany), Auditorio Nacional de Música (Spain) and Teatro Procópio Ferreira (Brasil). Drumming has also performed in outdoor spaces such as the gardens at Centro Botín (Spain), Fundação de Serralves (Portugal), and Praça da Batalha (Portugal), and in Church Square in Pretoria (South Africa). In addition, concerts take place in schools and universities, such as Academia de Música de Espinho (Portugal), Mamelodi High School (South Africa), Instituto de Música de la Pontificia Universidad Católica (Chile) and Universidad Complutense de Madrid (Spain). As well as exploring the diversity of Drumming’s programmes and performance sites, this paper investigates the connections between concert programmes and the places where Drumming performed. The aim is to understand how one group’s choices contributed to the dynamism of the Portuguese music scene. Methodologically, the places, concert dates, countries, composers and musical works performed by the group in the period from 1999 to 2022 are analyzed with SPSS software using optimal scaling. This shows the behaviour of the variables and the possible connections between places and works performed. This is followed by an analysis, using MAXQDA software, of the

content of an interview with the artistic director of the group, the content of the groups' social media, presentation catalogues, and the information available on news outlets and radio programmes. Finally, the triangulation of the results obtained from the SPSS and MAXQDA analyses shows that concert places and the repertoire are articulated in a way that promotes cultural diversity and the mediation of audiences. Simultaneously, this research demonstrates how studying the activities of music groups contributes to knowledge about contemporary cultural dynamism..

Keywords: Concert Places; Audiences; Drumming Grupo De Percussão.

Exploring the Japanese music scene of the 1960s from the perspective of kankyō geijutsu (environment art)

The 1960s saw the beginning of a rapid internationalisation of the Japanese art scene. Be it through John Cage's visit to Tōkyō in 1962 or the presence of Fluxus, Japan became a major player in a now globalized artistic contemporaneity. This internationalisation opened the way for a range of new practices, from happening to in situ installation, taking advantage of the new technological and media possibilities of the period. The world of music was no exception to these transformations and composers such as Takemitsu Tōru, Ichihyanagi Toshi, Yuasa Jōji or the members of the Ongaku group experimented, in the tradition of Cage, with new musical and performative forms. In this context, "Environment Art" (kankyō geijutsu) emerged as a term. It quickly became a generic term for these new intermedial practices, embodying a form of Japanese specificity while reflecting the internationalisation described above. Theorised by members of Environment no kai (Environment Society) and personalities such as architect Isozaki Arata, designer Kiyoshi Awazu or critic Takiguchi Shūzō, the expression referred both to an interdisciplinarity aimed at abolishing hierarchies and distinctions between practices, and to a new, more inclusive relationship between the work and its audience. The exhibition *From Space to Environment* (kūkan kara kankyō he) established the foundations for this turning point in the history of Japanese art. As its title indicated, it implied a shift between two conceptions of the site: In other words, the static, harmonious relationship between the viewer and the artwork has been broken, and the notion of site has shifted from a conventional "space" to a dynamic and chaotic "environment" that includes viewers and artworks. Along with a performance at the prestigious Sōgetsu Art Center, the exhibition brought together visual and sound works, each offering a specific type of interaction with the site and the viewer. Isozaki, in charge of drawing up the plans, defined three categories for these environmental works: *taidō* (reception, reaction, response) refers to the idea of in situ, *shikake* (mechanism) to the use of technological devices, and *taiken* (lived experience) to their inclusive and participatory nature. Although the term kankyō has been the subject of several recent studies in art history, it remains largely unfamiliar to musicologists. If scholars point out the intermedia turn of the 1960s, the site and the relation to the audience remains nevertheless underacknowledged as concerns for composers. Starting from the three perspectives described by Isozaki, this paper proposes a new framework for understanding some of these musical experiments, taking into account the great diversity of form that characterised them.

Keywords: Environment Art; Intermedia; Japanese Contemporary Music.

When museums increase listening: sound creation in the service of transmission

In a context of “cultural democratization”, French museums have been innovating for many years in the field of mediation in favor of enlarged audiences (diverse and impeded). The “museology of emotions” proposes new ways to access knowledge through the senses and active participation. At the crossroads of new technologies and multimodality, scenarized and immersive devices emerge in which sound design has an important place. As a new auditorium, the museum environment takes on the possibilities of the medium and proposes new spaces, places and moments of listening: what do we listen to in the museum? To what extent does it change the way we experience collections? What listening situations can the museum offer? In the form of narration, ambiance or soundscape, between in situ sound recordings, fiction and archive extracts, sonography seems particularly adapted to the development of sensitive environments where emotions become the keys to a more intuitive understanding of the collections. The success of the museum experience depends on the harmony created between scientific discourse and sound accompaniment. The immersive tendency in a reconstituted environment will depend on the coherence of the choices made in terms of composition and writing (in situ sound recording, fiction mixed with archive extracts, acting, and so on), production and diffusion (dynamic binaural sound, headphones listening and so forth). However, despite everything, we can legitimately question the effectiveness of these systems in transmitting knowledge. Indeed, carried out by service providers responding to calls for tender by museums, these devices are often part of an empirical knowledge inspired by expertise in cultural marketing and design. These disciplines encourage the development of technologies that are both close to the habits of cultural consumption (networks, interfaces, etc.) and lead to innovations (new generations of headsets and audio guides, etc.) and new paradigms (multiverse, NFTs, etc.). The improvement (performance, ergonomics, aesthetics, etc.) of immersive technologies associated with a miniaturization of tools, the optimal integration of interfaces in the exhibition scenography as well as the reorganization of sound spaces is thus intended to respond to the stakes of maximizing the visitor’s experience in a progressive logic. However, as Lortat-Jacob reminds us, the experience of listening in the museum is a human science above all before being an exact science (acoustics), and “[...] every man selects what he wants to hear-or what his culture has taught him to hear”. Through a node properly “visio-phonetic”, the meeting between visual information and aesthetically and formally coherent sound environments allows to reinforce the

narrative to which the experience adds in subjectivity. Thus, the trivialization of the media proposals in the museum called "immersive" or "interactive" is proportional to the conceptual vagueness surrounding these same terminologies. During these conferences, we will present an experimental protocol developed for the new Musée National de la Marine (Paris) whose objective is to determine the effectiveness of the immersive sound device created by Unendliche Studio for the young public.

Keywords: Museum Experience; Immersion; Listen.

The metaphorical sense of artistic discourse and its inphrastic narrative

A contemporary work of art that has multiple interpretations may also have hidden meanings and senses that are revealed in a new artifact that has been created by reading its artistic content. The essence of interpretation in such a case becomes the search for narrative threads between the content of the work itself and its formal assumptions. However, it is not only the musical material, the structure of the work, the extra-musical program, or the title that determines its aesthetic and meaningful qualities. The subject of the analysis will be a contemporary musical composition *Satin for cello and accordion* by Aleksander Nowak, whose title evokes extra-musical associations and whose meaning is hidden in the music itself. As a result of the inspiration of this work and its interpretations, which take place at the emotional and symbolic level, a translation of the means, artistic practices that identify the musical composition and the techniques of their transmission into the means of other works of art was made: audiovisual (animation) and choreographic works. That which exists above the medium allows making translations or transfers of content and artistic means from one medium to another with narration. Such activities are characterized by transmediality. Transmedial phenomena can occur at the level of content, they can be formal treatments present in different media (narrativity) or the aesthetics and stylistics of a particular historical period. The essence of a transmedia phenomenon is that there is no clear source of the event; the medium from which the phenomenon originates is either irrelevant or impossible to determine (in this case *satin fabric*). The phenomenon of the interpenetration of meta-artistic texts being a reflection of a non-verbal (musical) text in a non-verbal medium (dance, film, visual) is an example of artistic inphrasis. Thus, the essence of inphrasis becomes the subjective exegesis of the content of a musical work with a metaphorical title by the choreographer and visual artist, and this process of transformation of one code into another takes place in symbolic space. The aim of the presentation will be to discuss the translation of artistic means and content contained in Aleksander Nowak's work, including the supplementation of content that is not present in this musical work (emotional and aesthetic categories related to the title) into the means of audiovisual and choreographic composition, and the presentation of the artistic result, that was created as a result of the transmedialisation process.

Keywords: Intermediality; Artistic Inphrasis; Music Choreography; Transmediality.

Non Beat-based Rhythms in Xenakis' String Quartet Tetras

The idea of writing musical rhythms that no longer follow the stratification of beat and meter finds resonance in post-tonal music. However, although composers pointed out the necessity to overcome traditional notions of rhythm and this trace can in fact be observed in the 20th and 21st century repertoire, the field of music theory has not yet devoted itself extensively on this topic. In this presentation, we investigate the construction of non beat-based rhythms (NBR) in Xenakis' string quartet *Tetras*. By NBR we mean the absence of underlying sensation of pulse, normally perceived if rhythms elicit a regular accentuation. Beat therefore is defined not merely as a notational tool but as a perceptual phenomenon.

Although Xenakis did not talk directly about NBR in his writings, he wanted to do away with all of the inherited rules of composition in order to create new ones. In a way similar to Varèse's liberation of sound (1966), Xenakis wrote about the investigation of more deeply seated properties of space, freed from the tutelage of time. Metrical organization may be a way to constraint space exploration, as the spatialization of music required new forms to organize durations without beat. There are some elements of Xenakis' construction of rhythms in *Tetras* that dialogue with NBR: a) glissandi and tremolo exploration; b) irregular distribution of durations with geometric notation; c) fast passages in equal durations with irregular melodic contour; d) polyrhythms and e) non-aligned polyphony. As observed by Barthel-Calvet, there is a dialectics between regularity and irregularity reflected by the various types of formalizations: stochastic, sieve and permutations. Harley discusses sonic and parametrical entities such as glissandi, which he thinks contributes to "hinder rhythmic perception", although he adds: "a more generalized conception of rhythmic structures needs to be formulated in order to account for the range of materials used by Xenakis". Besides, there are the Brownian movements, a transposition of a natural phenomenon into a compositional tool that appears in many works, including *Tetras*. Therefore, we identify which passages include NBR and why; describe what are the compositional tools used to achieve these rhythms; and differentiate them in terms of how they are perceived in order to establish a preliminary typology. To judge beat perception, we will work with the piece's both score and audio, creating graphic representations that reflect hearing when necessary. The analysis considers every beat level in the metrical grid, as this score is written mostly in traditional notation, with the support of some perceptual preferences and thresholds described in the literature: preferred tempo, tempo limits and just-noticeable difference. We will also use a broad concept of accentuation, as multiple factors in music can be

responsible to create regularities or disturb them. In some cases, the notion of tempo will have to be replaced by density, when there is no perceptual measure unit to serve as reference.

Keywords: Non Beat-based Rhythms; Xenakis; Modern Music.

Nicholas Freer
University of Melbourne, Australia

Points of transition in John Coltrane's harmonic practice 1957-1960; decoupling and repurposing telos in jazz harmonic organisation

Roman analysis has long been a convenient tool for interpreting jazz harmonic organisation. The analytical effectiveness of Roman numeral analysis, however, is contingent upon the adherence of a composition's harmonic organisation to a diatonic frame. As tonality and harmonic organisation has evolved, the utility of applying Roman numeral analysis to jazz harmonic organisation has waned. Coltrane's compositions "Moment's Notice", "Lazy Bird" and "Giant Steps" represent points of transition in jazz harmonic organisation, where an analyst must move beyond identifying surface level Roman numerals to a global consideration of harmonic organisation and teleological direction. Coltrane's repurposing of the II-V progression through side-stepping enables a broader consideration of harmonic teleology in his compositions, including the migration of teleological mis-direction within his harmonic syntax.

Keywords: Teleology; John Coltrane; Roman Numeral Analysis; Lazy Bird; Moment's Notice; Giant Steps.

Rigoletto by Damiano Michieletto: a case study to understand the complex horizon of contemporary opera staging

Since the annus horribilis of 2020, passing through worldwide lockdowns, Opera houses were forced to put live performances on standby and to experiment with the new notion of becoming fluid through «digital liveness» (Gemini et al. 2020). New ways of being present and experiencing live performances have emerged. Many European and North American Opera houses have worked on new online engagement strategies. In addition, the last few years can be regarded as the revival of opera adaptations for television and cinema, known as film opera (Citron 2000, 2010; Senici 2009, 2019; Grover-Friedlander 2005). This hybrid audio-visual product has been made since the first decade of the XX century but, after its successful surge in the 30s, 40s and early 50s has gradually declined. Italy's Opera houses, and specifically Teatro dell' Opera in Rome, have been promoting this fluid practice of contamination between opera and cinema since July 2020.

The starting point was a peculiar *Rigoletto*, a staged film opera by the Italian director Damiano Michieletto – famous mostly abroad for its innovative approach and modernisation of repertoire works – which is at the same time a staged performance and a film opera. It's a staged performance because the chosen place for the production, the Circo Massimo of Rome, served as an en-plein-air theatre for the singers with props, sets, costumes, lights, stage movements and for the audience. It's also a film opera firstly because the product was re-mediated live on National television and, secondly, because Michieletto re-mediated some details of the performance, made by three steady cams on stage, and some pre-recorded videos on the big screen in the back of the stage and on the product accessible by tv audience as well.

This paper will first aim to add new consideration on the matter of contemporary opera staging (especially of repertoire operas) and how to make sense of the complexity of it given the dramaturgical use of different media on stage (Havelková 2021, Del Gaudio 2020, Yaskkevitch 2020, Golianek 2020, Novak 2018). Then, the article will examine dramaturgically and aesthetically the staged film opera of *Rigoletto* by Michieletto to investigate its non-duality of genre and the peculiarity of the production in the present operatic horizon. .

Keywords: Contemporary Opera Staging; Media On Stage; Digital Technology; Film Opera; Damiano Michieletto.

The music of Queen: dynamic soundtracks and a new audiovisual relationship

A career that develops in a period of more decades like that of English rock band Queen, necessarily compares with a big variety of other artistic currents and expressions. The relationship between the music of Queen and the other visual media is quite complex and can be analyzed following different paths. The iconography of the group spans several media and forms of communication, with the aim to increase the dramatic impact of the performance or the significant influence of the image of the band itself. The invention in the last century of a totally new media – the cinema – gave new impetus not only to figurative arts, but even to music since these representations needed a cooperation between different forms of entertainment: a fluid and dynamic circulation of signs, sounds and images was therefore born to achieve this new aesthetic aim. Regarding the music written specifically for movies, the research is in some manner different, since the band has to cooperate with directors to obtain a balanced final product, that is still nowadays enjoyable and follows a precise aesthetics: there is a precise audiovisual relationship for the first time in cinema that opens to new possibilities creating a dynamic circulation of sounds and images. One main direction for Queen started in 1980 with the soundtrack of the movie *Flash Gordon*, for which the rock band wrote the music mixing the sounds of synthesizers and a real orchestra, giving thus the movie and the score a similarity with a classical opera for the general conception and the proportions, including some references to Wagner with the use of the leitmotif. Six years later Queen wrote the music for another movie, the sci-fi *Highlander*. This time, they preferred focusing on more standard songs-form structure, but they were influenced by the story itself and its characters and therefore the soundtrack keeps these elements and gives them new form: even in this case the collaboration with the movie director was a central point in the musical score development and this partnership will go on in musical videoclips too. Regarding the details of soundtracks, Queen wrote for the mentioned two sci-fi movies following a particular principle: if usually when movie directors or producers choose a rock group or artist to write a soundtrack, it is mainly a single track that can be heard at the end credits. But for Queen the process is more articulated and deeper: they wrote many songs that were used during all the movies, and their music is merged with the more classic orchestral scores composed by Howard Blake (for *Flash Gordon*) and Michael Kamen (for *Highlander*). Queen had the possibility to follow the script and the shootings, and, in that way, they could create a music that better merge with images,

since it was created together and not simply just added later: this idea gives the whole project an internal structure and coherence that keep it valid after several years.

Keywords: Queen; Soundtracks; Iconography.

Proximities and collisions: the compositional process of occulta scientia siderum

Compositions from 2021 to the present explore the concept of proximity through multiple methods and typologies of collision and combination. Proximity is a loose term that describes many of my approaches – especially when related to my use of early musical material, Renaissance compositional technique, and types of instrumental playing techniques. Another way of describing proximity is through ‘distance’, or the distance of a composition from an original source or general ‘convention’. In the context of my compositional approach, this refers to two primary typologies and one secondary typology: the distance from an original source material; the distance from general conventions of instrumental playing technique; the adaptation of historical compositional techniques within a contemporary musical context. The last typology in this list concerns proximity by exploring how relationships to and applications of historical compositional techniques adapt into contemporary contexts and the distance they have from the original usage of the techniques. Collision, like proximity, is a loose term interchangeable with combination and the levels in which collision or combination work are numerous, from local-level materiality to extra-musical-level combinations of seemingly contrasting practices. In other words, I use methods of collision and/or combination to create pieces that explore proximity through distance. This presentation will analyse the process of my bass clarinet solo *Occulta Scientia Siderum* (2021) which takes material from John Dunstable’s 15th century motet *Ascendit Christus* as its source material. I will describe how I use different levels of parametric construction densities and monophonic polyphony to fluctuate and control the level of proximity to the source material, as well as refer to the adaption of and reference to techniques typically used by composers in the English *Countenance*. Finally, I will go onto discuss whether this approach worked in exploring proximity; the specific limitations of the process; and the more recent avenues that have been investigated using derivations of this process.

Keywords: Collision; Proximity; Middle Ground; Superimposition; Palimpsest; Erasure.

Listening to the Beat in Silence: investigations into silent disco and individual listening in collective events

Silent disco is a fairly new form of collective musical listening. While listeners are present in a collective context, like concerts, parties, or performances, the listening in a silent disco is individual with technology like wireless music streaming and headphones. In some cases, listeners can choose between different tracks. On other occasions, you must follow the selection from the DJ. The phenomenon challenges some fundamental aspects on listening to a performance in a collective event. Silent Disco enables listening in context that traditionally is not suited for listening. Examples is museums, libraries, shopping centers, and other public spaces. Historically, we discuss silent disco in relation to developments of technology that facilitate wireless systems and individual listening. This is not a new phenomenon, but recent technological developments facilitate a new kind of shared individual-collective experience that leads to new forms for music appreciation. We also discuss social and cultural perspectives, arguing for the relation between rave and house party culture, pop up culture, and connections to social networking concepts which are not conventionally tied to location, time, and place. The paper takes an ethnographic starting point, exploring a recent event of silent disco in Norway. The event included students gathering for their semester start and arranging a silent disco in the woods. The event is described, using fieldwork and participant-observation as methodology. Other studies have previously studied silent disco in relation to psychological perspectives, cognition, health care and technology, and memory. But ethnographic research which are theoretically situated within music sociology and anthropology lacks. We interpret the event with theories from subcultural theory and especially milieu studies, investigating the practice of silent disco as a performative social and musical event, strengthening the participants interconnectedness, belonging, and sense of shared experience.

Keywords: Silent Disco; Music Sociology; Ethnography.

(Un)listening to Music: Rethinking Musical Values in the Age of the Algorithms

Much of our daily lives is defined not by sound and music intended to be heard in concert halls or other circumstances of aesthetic enjoyment, but by a variety of audiovisual products that accompany us in an involuntary and often unconscious way. A musical work that aims to provide a certain atmosphere or encourage a particular activity should not, in general, demand an effort on the part of the listener. The less conscious the consumer is of the information provided in the listening process, the more effective it becomes. The market segment that distributes music which intends to remain 'inaudible' in the foreground, performing a discrete and ubiquitous role, has grown exponentially in the algorithms age (cg. Kassabian 2013; Quiñones et al. 2016; Gomes- Ribeiro, Malhado et al 2018).

The production of a musical text for these circumstances does not only depend on the knowledge and the ability to manage creative tools, but also on a deep awareness of the social rhetoric of listening. However, the process of systematic devaluation to which these musical works are consigned, implies a generalized lack of a conscious debate concerning its production, professional mastership, and reception. T. Adorno, or even M. Weber, in the foundations of the sociology of music, already debated, the enormous relevance of the study of the sociocultural characteristics of music and of its auditory consumption.

This exposition seeks to examine how specific Portuguese academic music communities interact with the teaching, performing, and learning tools associated with library music. Our theoretical framework combines media studies, sociology, and musicology. In the context of a multimethod research, the study uses in-depth qualitative interviews with a selected sample of individuals. Respondents have extensive practical and/or theoretical musical training and are music and musicology students, instructors, and professionals in the Portuguese music academic area.

Our research show that listeners compare library music circulation with audiovisual activities like cinema and television. This practice consists of "well-established musical 'signifiers' so that the mainstream audience's recognition will be instantaneous and homogenous" (Tagg 1999, 9). Respondents recognize transversal compositional patterns, mentioning the capacity for remembrance, communication, or audiovisual relationships. However, being often seen as "mass music", it tends to be underestimated or obliterated by some academic circles or music agents, since people learned to be inattentive (Adorno 1991). This music is, in fact, "in action" (DeNora 2000), the audience

is capable of listening, understand and respond, despite the unconscious effects and affects to most people. Besides being a professional endeavor with social and aesthetic conventions, the art world (Becker 1982) of library music tends to be integrated in audiovisual uses whose social practices are background sound with secondary relevance. From pre-existing music of Tik Tok to YouTube playlists chosen to be everyday activities' soundtracks, those soundscapes are simultaneously everywhere and unheard (Gorbman 1987). Described with concepts like illustration, waiting room sound, or even plagiarism, its perceived absence of creativity leads to a sense that the sonic material lacks agency and gives rise to hierarchical discourses which form group musical tastes and rejections.

Keywords: Listening Behavior; Library Music; Musical Value.

Recovery of analogue devices for live electronics: case studies in recasting Korg SE500

Mixed music with live electronics has, inherent to it, a problematic that exists since its genesis and that relates to the rapid technological evolution of the resources used. Primarily, the analogue methods used to process sound during the second half of the 20th century, have gone through a process of obsolescence with the transition to digital technology. Secondly, the velocity in which digital technology evolves – operative systems, softwares, hardwares – brings new and constant challenges, nowadays, to the sustainability of works written in this genre. This work focuses on analogue electroacoustic devices, whose obsolescence was a conditioning factor for the disappearance of these pieces. We think that the most viable and consensual way of reverting this process and recover these works is through a process of technology transfer called recasting. This method consists in the assembly of information about the machine parameters, about the pieces needs, and about performance necessities to create emulations of the devices in digital format. This migration and the flexibility offered by this type of softwares also provide a chance to rethink these works performance when it comes to the ease of handling the electronics. We present three examples of works for saxophone and analogue electroacoustic device that were subjected to this process and that use specifically the echo chamber Korg SE500. *Sax-Blue*, by Jorge Peixinho, *Variants Invariants*, by Costin Mioreanu, and *Mnemosyne et l'oubli*, by Marc Tallet, all written in 1982. One of the priorities concerning the way the emulation was made, was that it should be close to the intentions of the composers regarding the way the works should be performed. The saxophone player should himself control the echo chamber manually during the performance. Nonetheless, the flexibility offered by the programming software used, Max/MSP and later Ableton Live, made us think about more accessible and easier ways to perform these works. Therefore, the emulation was also made to allow the automation of the parameter changes that the works require. These parameters are organized in lists that the performer triggers with a pedal in specific places of the piece. Since the performer must have an active role in the control of the emulation in both versions, the use of external MIDI controllers is required. Therefore, the use of these controllers influenced the evolution of the Korg SE500 emulation. An analysis of the works was required to assemble all technical information regarding the electronics part, but a comparative analysis revealed that the Korg SE500 is used in similar ways in all three works and the composers used the same symbols to specify parameter changes. Therefore, the same emulation made can be used in all works with little adaption being

required. This process has proven to be very effective in the search of a solution for these works. Nevertheless, new limitations and challenges arise due to the fast digital technology evolution. Therefore, we must keep thinking forward about more and different solutions aiming for greater sustainability of repertoire for instrument(s) and live electronics.

Keywords: Recasting; Recovery; Korg SE500.

Why do we need, if we need it at all, the concept of ambient listening?

One of the paths of inquiring the cultural, philosophical, anthropological, but also technological and economic contexts of listening facing the turbulent sonic ecosystem (funded on the music omnipresence and ubiquitous listening) is one marked by the historical and theoretical studies on background music, both artistic (ambient music, Gebrauchsmusik, tafelmusik, musique d'ameublement, Muzak-Plus, and so on) and commercial one (muzak, audio marketing, royalty-free music, etc.) captured as a cultural practice of listening. This emerging field of inquiry delivers a concept of ambient listening based on various epistemologies of music, sound and soundscape – from musicology, through sociology or anthropology of music, to music psychology, neuroaesthetics, acoustics, media studies, and, of course, sound studies. Even if the background music is usually banned from musical discourse as a nonmusical *per se*, the reference to this specific music-culture is present in almost all mentioned research fields (most often as a negative example). The growing perspective of ambient and background music studies carries the pure type figure of a listener (real or imagined) described by the mode of distracted or peripheral listening. This perspective not only updates the fundamental problems of music, but also enriches the interdisciplinary research inquiring the idea of music functionally fulfilling the 'ambience' of our life. I'd like to devote my presentation to a) a preliminary introduction to ambient music studies and background music studies I performed in my PhD, b) a brief indication of its major epistemologies and conclusions, which are necessary to c) explain the concept of ambient listening as a possible tool for the research on today's listening habits. At the end, I'd like to highlight the possibilities of exploring this concept in other fields of research surrounding the musicscape (combined music, sound and soundscape).

Keywords: Ambient Listening; Distracted Listening; Background Music; Ambient Music; Musicscape; Omnipresence Of Music.

Renata Kambarova
Anton Bruckner Private University, Austria

Approaching Nola, Shashmaqom, and Western Contemporary Art Music through Intercultural Exchange and Artistic Research

I am exploring ways to create meaningful, transformative musical relationships between flute and nay players through my own example, while conducting an intensive study of the technique of nola, the traditional ornamental technique between vibrato and trill, used in both vocal and instrumental performances in Shashmaqom. With Shashmaqom I mean the classical genre and pieces that are mainly played and taught in Uzbekistan and Tajikistan. At the same time, I will investigate the transverse nay, learn about its most representative repertoire within the tradition of Shashmaqom from experts in the field, as well as its history and nowadays practice. After developing my own transcultural expressive techniques, I plan to work with composers and musicians from both cultures to develop mutually influenced ways and means of making music and to express a third place between two musical backgrounds. Then I expect to be able to transfer the insights gained to Western concert flute practice and make them accessible to Contemporary Art Music composers. I ask: How can a Western-trained instrumentalist approach Shashmaqom and the tradition of nola and blend it with Western contemporary music in a balanced and respectful way? In the article, I propose to show how my research design helps me to blend Situational Analysis with Artistic Research, including improvisation, electro-acoustic composition, field research and semi-structured interviews.

Keywords: Shashmaqom; Artistic Research; Cultural Identity.

Ricardo Thomasi and Silvio Ferraz
[RT] CNPQ University of São Paulo, Brazil; [SF] University of São Paulo, Brazil

Inhabiting Traces: Creative Insights from Experiments with Artificial Ecosystems

According to Ingold, a world that is occupied but not inhabited, that is filled with existing things rather than woven from the strands of their coming into-being, is a world of space. Against the notion of preexistent things occupying spaces, Ingold underlines a world of becoming. In his view, the common sense of relational spaces and networks implies a separation between the nodes and the connections, assuming preexistent nodes that are closed in on themselves before their integration into the network. Instead, inhabitants, then, know as they go, as they journey through the world along paths of travel. This ecological view is coherent with our investigation of an emergence-based structural thinking for music. We developed a spatially-extended model based on acoustic and optical feedback loops, called Artificial Ecosystems. The initial model was inspired by Di Scipio's AESI project, but following different methodological and theoretical paths. The possibility of coupling audible and visible ecosystems has corroborated our theoretical framework based on a) metastable condition, b) feedback topology and c) membrane-like behavior, resulting in a spatially sensitive system emerging from acoustic and optical dynamics. The model of artificial ecosystems offers a fruitful territory for artistic research, as it brings concepts of complexity and emergence to a concrete plane, where they can be studied and observed in practice – and not just in a poetic and/or theoretical scope. It is supported by Simondon's Allagmatic theory, where the notion of implicit forms brings to the foreground the spatial organization of the components and an energy flow schematic that emerges and is modulated by the components' operative relationship. So, spectral configurations, fluctuations and distortions, among other dynamics can be heard and seen as traces of components inhabiting. Contrasting with traditional approaches, it challenges musical formalization in three dimensions, at least. First, for those that consider sound as a pre-existing entity, mainly influenced by sound recording technologies. Second, sound source as a stable or deterministic entity, mainly in the traditional notion of instruments. Third, pre-established sound profile expectations, influenced by sound synthesis tools and the existence of ADSR envelope models, and the spectromorphological thinking as well. Thus, closer to an acoustic ecology, we find in the soundscape's heritage not a space for observing and modeling nature subverting the acoustic medium into sound objects, therefore returning to the previous issues. Instead, we find an experience of performance in and through the field; which is driven by

listening and in which listening is tied to its own movement. The embodied condition of artificial ecosystems opens new ways to think of digital technologies and their impact in musical performance, since the information flow becomes more important than the information itself – in the symbolic fashion. First, because digital media is not more a container of data, but a place whereby information takes shape. Second, because signal conversion becomes a process of loss of information that shapes signal flow through energy dissipation, therefore becoming an order factor.

Keywords: Acoustic Ecology; Artificial Ecosystems; Emergence Theory.

The Collective Consciousness, Sound Art, and Festivals- an Avant-Garde Insight

Based on Henri de Saint-Simon's *Opinions littéraires, philosophiques et industrielles* (1829), the term *avant-garde* defines the figure of the artist as the driving force behind reform in society. In this respect, it is necessary to think about how from its values of social and ecological intervention, *Lisboa Soa Festival* raises a collective consciousness and brings sound art to the public space, underlining the interventive character of creative practices related to sound arts in urban areas. From an intersection of the fields of study of the festival, sound art, and sound studies, this object of study presents an interdisciplinary perspective in the discourses on sound art and environmental sustainability, making this art form a source of material and social critique. This festival is a multidisciplinary artistic event, which aims to promote exploratory projects and the relationship between artists, cultural agents, and the public, articulating values of transformation and intervention in the urban spaces of Lisbon. By bringing sound art to the public sphere, and making it accessible to diverse audiences, this festival creates a pedagogical space of awareness of acoustic ecology, based on a dynamic relationship with the public, which stimulates an ontology of sound through a cultural and artistic approach. Based on an ethnographic approach, this study intends to examine the conceptual issues associated with *avant-garde* art, reflected in the programming and activities developed by the *Lisbon Soa Festival*. By taking art beyond the boundaries of concert halls and art galleries, this festival is an example of transformation and social activism, which encourages autonomy and freedom in artistic creation. Alongside establishing democratic cultural spaces in constant renewal, this event presents sound art as a critical catalyst for societal transformations.

Keywords: Sound Art; Festivals; Avant-Garde; Public Space.

Enrique X. Macías Collection: processes and results of the digitization of magnetic tapes

Enrique Xerardo Macías Alonso (Vigo, 1958-1995), a Galician composer from the late 20th century with a post-serialist aesthetic, was the first composer to perform electroacoustic manipulations in Galicia and a pioneer in expanding new parameters to his compositional language. Macías relationship with Portuguese composers was extensive and fruitful, establishing close connecting link with Jorge Peixinho —a great interlocutor of electronic music for Macías in his early beginnings—, Álvaro Salazar, Clotilde Rosa, Constança Capdevile, Emmanuel Nunes and Miguel Azguime. In this exposing we will present the recovery process and the results on the tapes of Enrique X. Macías that were located at Azguime's home in the town of Rebelva, Portugal. The recovery and digitization work were made at the Laboratório de Informática Musical (LIM) del CESEM—Centro de Estudos de Sociologia e Estética Musical de la FCSH- Universidade Nova de Lisboa, under the supervision of Professor Dr. Isabel Maria Pires. In addition to the desire to preserve contemporary Galician music and the enlargement of the Enrique X. Macías collection, we intend to portray the methodology, the problems found and the results of the work executed magnetic tapes of the Galician composer, so that it can be applied to future phonographs collections in this type of support that appear in future research in Galicia, that are not in their best condition of conservation. All these objectives will facilitate the work of analysis of the scores and electroacoustic materials for the realization of our doctoral thesis. In addition, to be able to have all the collected documentation available, keeping alive and giving value to this important patrimony of Galician contemporary music.

Keywords: Enrique X. Macías, Electroacoustic Music, Magnetic Tapes

Foley Gesture

The research project “Acousmatic Foley” addresses common traits between foley art and Concrete Music, based on the idea that the foley artist is an acousmatic listener and, in turn, that acousmatic listening is a form of fiction. In line with this, the study argues that both fields have similar treatment of the “sonorous object”. For this purpose, the research builds on two lines of thought: the “son-en-scène” and the “mise-en-son”. Firstly, the “son-en-scène” focuses on the sounds of the filmic mise-en-scène (and its sound props), from very early cases to contemporary instances. The focus on these sound-props provides a perspective of sound for film that emphasizes its role as a tool of fiction and, thus, foley as the craft that leads to that experience. Secondly, “mise-en-son” sheds light on the making of the sound itself by exploring the concept of musical gesture. Either in contexts in which the musical gesture is visible (as with instruments), more cryptic (as with electronic devices), or completely delegated (as in acousmatic music), gesture can be seen a form of agency. Given that foley consists of maneuvering a sound-prop, gesture is as central to foley as it is to musical practices. Furthermore, the idea of gesture carries the same conception of the “sonorous object”, that of an “intentional unit”. In this line, and in particular when of acousmatic nature, the sonorous object is analogous to the sound-prop. Within this context, this paper puts forward an understanding of “foley gesture” via the case study of “reticências” – a live performance of FM noises and incidental sounds. The relationship between incidental sounds (foley) and abstract noises (electronic music) in “reticências” demonstrates how the idea of gesture can go from shaping the sound further into the way the sound is perceived (staging sound fiction). In other words, the concept of gesture in “reticências” bridges the poetic and esthetic, as in Nattiez’s semiotic distinction, towards an experience of “acousmatic foley”.

Keywords: Foley; Gesture; Acousmatic; Film; Sound Design.

Some remarks on musical energy: analytical approach from Iannis Xenakis' ST/4-1, 02061962

In 1958, in the drafts of *Concret PH* (as observed by Makis Solomos), Iannis Xenakis notes that "a music is a set of energetic transformations". In 1968 Xenakis, this notion of energy appears as a thematic in the composition of *Kraanerg*, (kraan. – to accomplish and erg.- energy) and from the 1990s, more precisely in 1994, the notion of energy gains more strength in the text as "Sur le temps" and "Conversation" with Morton Feldman, by noting that "the problem of composition is how to use this energy" and further adding that energy can be in the "combination of sounds, the timbre, the rhythms, the length, and the tempo of the piece". Recently, the study of the notion of energy in Xenakis has received some studies by Makis Solomos, Christoph Casagrande and Mikhail Malt. Solomos gives a reading of the notion in Xenakis' thought, Malt and Casagrande deal specifically with works. Malt analyzes *Bohor* and looks at the energy manifested in the evolution curve of sound intensity, Casagrande analyzes the set of forces present in *Kraanerg*: iterative, granular/ chaotic, fusion/fissionary, massic and the pulsative forces. Such forces are found in other works by the composer and corroborate the idea of thinking about energy from the tendencies of its elementary components. A compositional thought that starts from the "corpuscle-sounds with their spins" (units of measure of angular momentum of elementary particles), as Xenakis proposes in his article "Musique et Originalité". In order to think about energy from the elementary components and the intensity curve, it is worth bringing Xenakis' thought closer to the study on the idea of "potential energy" as studied by Gilbert Simondon. Simondon relates energy to isotropic or anisotropic distribution of elementary components, an idea very close to the one Xenakis employs with the notion of entropy from the ataxia functions on the time and frequency axes. Thus, a system is isotropic according to the symmetry of distribution of elements. And anisotropic, when the tendencies of its components are not symmetric. Thus, isotropic systems indicate an equilibrium of all their components in a way that does not show a trend of transformation, corresponding to a stasis of the system. The anisotropy of a system, on the other hand, would clearly indicate its kinesis, the presence of privileged directions of the system. To address such a question, I present a study of the quartet *ST/4-1, 02061962*, a rewritten of *ST/10-1, 080262*, observing the distribution of the dynamic elements at each moment of the piece: the sound-corpuscles and their spins. Spins are related to the tendencies not only of microparticles (as in the *glissandi*), but also the general flow of the composition distinguishing the isotropy/anisotropy of the moments that formally constitute the piece, and in the passages between such moments. In this sense, I distinguish the

configurations (nuages, Cf. Xenakis, “Les chemins de la composition musicale”), and their potential energy relative to the kinesi/stasi balance of musical flow in Xenakis’ string quartet.

Keywords: Musical Energy; Iannis Xenakis; Gilbert Simondon; ST-/4-1.

A functional approach to spatial musical analysis

Space and spatiality have always been considered in the compositional practice by composers and artists. Throughout history many composers have exploited the spatial parameter in their music, actively using it inside their compositional practice. Particularly in fixed acousmatic music the spatial experience of the work has become primary, as a vast range of contemporary technologies for spatialisation permit sound to be positioned and moved through space with remarkable precision. However, space has been treated as a true compositional parameter only recently in music history: an established language and theoretical framework for articulating and analyzing the space and spatiality in creative practice is still underdeveloped. This research aims to create a new approach to the analysis of spatial music, particularly fixed acousmatic music, by introducing terminologies and categories for the identification of spatial placements and movements. Several works have been analyzed, ranging from Mozart's Notturmo in D major for four orchestras K286 to Ives' Unanswered Question, from Xenakis' Terretektorh to Trevor Wishart's Encounters in the Republic of Heaven. These compositions have provided case studies for the development of a basic unit for spatial analysis, the "Spatial Sonorous Object", and an ontology of roles that spatial movements and placements play in musical works, called spatial function. In this discussion, several types of spatial functions will be explored with relevant musical examples, along their functional purpose and link to their spectromorphological features..

Keywords: Spatialisation; Acousmatic Music; Musical Analysis.

Intertextuality Networks for a New Composition: Articulations, Interrelationships, and Emergences through Listening

In music, the idea of intertextuality produces an immersion in musical creation, through an analysis of previous compositions. In this proposal, we will present the intertextuality process in the commission by the guitarist Teresinha Prada to the Brazilian composer Danilo Rossetti of a mixed work for classical guitar: *Ondas-Sombras-Reflexos* (2022), which dialogues with *L'Oiseau-Lyre* (1982), by Portuguese composer Jorge Peixinho, since the Brazilian guitarist had been researching particularities of plucked strings between Portugal and Brazil. Peixinho was an avantgarde composer and founder of the Grupo de Música Contemporânea de Lisboa and *L'Oiseau-Lyre* is a seminal work in the history of the instrument due to the link between the idiomatic idealization of plucked strings and the poetics of its creator. In *L'Oiseau-Lyre*, harmonic structure and melodic cells are outlined in a post-tonal system, whose musical flux defines the sections from the generating cell, and how Peixinho's compositional gestures add modernity to the weight of the instrument's tradition. The question that arises in this proposal is how the notion of intertextuality can overcome the writing of the instrumental score and spread through other sonic means in a mixed work. Our hypothesis is that it occurs through an active listening carried out with operational features, searching for articulations and transversal connections within the same work or between works, identifying structures and layers that relate and interconnect each other, and creating individual listening relationships. This may be the case of *Ondas-sombras-reflexos*, a musical work in which the intertextuality with the work of Peixinho exists in at least two manners: 1) in the electronic fixed media, whose materials used derive from recordings of the 1982 piece, in mirroring with the plucked strings and traces of the Iberian musical culture in this injunction, and 2) in the guitar instrumental writing, which contains intertextual elements that appear in Rossetti's work derived from the work of Peixinho, mainly regarding the instrumental gestures and extended techniques used. Both cases will be detailed in the presentation. This proposal intends to present *Ondas-sombras-reflexos* and bring contributions to the musical performance area based on intertextuality studies, which enabled to resume *L'Oiseau-Lyre* to problematize issues of performance, composition, and listening questions and relationships. As the methodology to address the question proposed, initially the set of compositional processes, interpretative decisions, and collaborative techniques used to prepare the performance will be exposed, presenting the scores involved. Next, specific analyses with systematic methods of both the scores and recordings will be carried out, using computer-aided tools based on audio descriptors,

generating graphical representations alternatives to the musical score. Based on the study of intertextuality and the analyzes that articulate the two compositions, seeking a conclusion, it is proposed to discuss whether the networks and layers of intertextuality between the two works give conditions to the emergence of new forms of signification from the relationships created, such as an enactive listening, considering the notion of enaction proposed by Varela (1994).

Keywords: Intertextuality; Listening; Creative Processes.

Biographies

André Malhado

André Malhado is a musicologist, music producer, and cultural commentator. He is a Ph.D. student in Historical Musicology at the Faculty of Social Sciences and Humanities of the NOVA University of Lisbon and holds an FCT Ph.D. Scholarship (SFRH/BD/145674/2019). In 2019, he earned a master's with a dissertation on the cyberpunk music label. With a sociomusicological perspective, problematized cyberpunk in digital and audiovisual media between 1982-2017. He received the awards of best graduate (2018) and master (2020) student and a Merit Scholarship awarded by Public and Private Higher Education Institutions to students with exceptional performance (2019). His work spans the fields of music sociology, digital and audiovisual cultures, gender, and sexuality. He is a member of SociMus, NEGEM, coordinator of CysMus since November 2021, and is integrated in the Group of Critical Theory and Communication (GTCC) in the Centre for the Study of the Sociology and Aesthetics of Music.

Ângela da Ponte

Ângela da Ponte (1984, Azores) is a composer, professor and researcher currently living in Porto (Portugal). She has received commissions and has been performed by many prestigious ensembles, soloists and orchestras including Smirnov Quartet (Basel Music Academy), Remix Ensemble (PT), Oregon Symphony (US), Vertixe Sonora (ES) and Ensemble New Babylon (DE). Recognition of her work includes the performance and premieres at several festivals such as BEAST FEaST (UK), Festival Visiones Sonoras 2016 (MX), Audiokineza (PL), 2020 XXI International Cerveira Art Biennial (PT), Kulturfabrik – 33,7 Festival (LU), Música Viva Festival 2022 (PT) and major distinctions include the appointment for Young Composer in Residence 2011 at Casa da Música (Oporto), ISCM Virtual Collaborative Series 2020 and representing Portugal at the 67th International Rostrum of Composers (RS).

Azadeh Nilchiani

Azadeh Nilchiani is an artist, researcher and university lecturer, born in Tehran and based in Paris. Her practice is interdisciplinary, combining sound, visual and spatial media, installation, video art and electroacoustic composition. She holds a PhD in Arts, on "Sound installations in urban spaces" from the LISAA research laboratory, University Gustave Eiffel, 2021. Graduated in 2003 from the Faculty of Fine Arts of Tehran University in Iran, then in France at ENSAD (École nationale supérieure des arts décoratifs) in Art-Espace and at the École nationale de musique de Pantin in 2009 in electroacoustic composition. She was an associate researcher at the Bibliothèque nationale de France on the collection of the Institut international de musique électroacoustique de Bourges (IMEB) from 2016 to 2019. She worked as a visiting lecturer in new media and sound at Gustave Eiffel University (2014-2019), also as a temporary teaching and research associate (ATER) at the University of Lille in musicology and new technology (2019-2021).

Beata Oryl

Beata Oryl graduated at the Stanisław Moniuszko Academy of Music in Gdańsk, specializing in Rhythmics. Currently employed at her alma mater as a research and teaching worker at the

Department of Piano Rhythmics and Improvisation at the Faculty of Choral Conducting, Church Music, Artistic Education, Rhythmics and Jazz. In her activities, she focuses on the relationship between music and movement, looking for various forms of artistic expression, using elements of contemporary dance techniques, individual movement expression, and body self-awareness influencing the expressiveness of the created creations. Her achievements include original works on stage movement, choreography for performances, operas and concerts.

Carlos Villar-Taboada

Carlos Villar-Taboada Musicologist, specialized in music analysis (Pitch-Class Set Theory and Topic Theory) of Hispanic music since 19th Century onwards –mainly Spanish and Cuban. Academic training with short research stays on contemporary music and music analysis (1998-2001) at the Université de Paris IV-Sorbonne and IRCAM (Paris), and the Columbia University (New York). Since 2007, he works as Senior Lecturer in Musicology at the Universidad de Valladolid (Spain), where he holds the Chair of the Musicology PhD Program. He has given seminars on music analysis at several Spanish universities, and he has directed Master thesis and PhD dissertations on relevant figures and events of the Spanish music in Contemporary Age. He collaborated in the organization of the conferences *Música y Filosofía: siglos XIX-XX* (1999-2007) and *Joaquín Rodrigo y la música española* (2003-2007), while currently directs the *Jornadas de Investigación Musicológica: siglos XIX-XXI* and, more recently, *Tópicos en la música hispana (siglos XVIII-XXI)* (UVA, 2022).

Caroline Wilkins

Caroline Wilkins, Independent composer/performer/researcher, comes from a background of new music performance, composition and theatre, and has worked extensively on solo and collaborative productions involving these. Her particular interest lies in creating new forms of presentation, whether in the field of inter-medial sound theatre, sound poetry or performance art. She studied at the Royal College of Music, followed by new music theatre composition study with Mauricio Kagel in Cologne, later completing a practice-based PhD in sound-theatre at Brunel University. Current activities include conference presentations and academic publications.

Cláudio Pina

Cláudio Pina (b.1977) Sound artist, improviser, organist and composer. Titular organist of the historical organ at the Parish of Ajuda (Lisbon). Researcher in GIMC (CESEM). Holds a DAS regarding contemporary organ music and a MA distinguished with the Dean's Honour Roll 2018. Currently a PhD candidate and FCT fellow in the same field (ESML/FCSH). Studied in Gregorian Institute of Lisbon, Hot Jazz Club and Physics Engineering (FCUL). Had further studies with Adrian Moore, Åke Parmerud, Annette Vande Gorne, Barry Truax, Gilles Gobeil, Hans Tutschku, and Trevor Wishart. His work has been premiered worldwide in: Arte no Tempo, Aveiro Síntese, Binaural Nodar, Festival DME, Festival Zeppelin, Iklectic, MUSLAB, MA/IN, Perspectivas Sonoras, Lisboa Incomum, L'Espace du Son, and World Soundscape Project. His acousmatic works have been published in MA/IN 2019 and *Métamorphoses* 2020. Self released two albums, "Asteroeidês" and "Palimpsestus". Released in 2022 "Avant-garde Organ" funded by GDA Foundation and published by 9musas (claudiodepina.com).

Danilo Rossetti

Danilo Rossetti Composer and researcher with focus in the use of technology and interdisciplinary research in creative processes and musical analyses performances, Danilo Rossetti is author of musical works for different formations (solo or ensembles), acousmatic, live electronics and multi-modal (audiovisual installations, music and dance, networked and telematic music), and author and coauthor of several articles concerning creative processes in music and musical analyses. He is Assistant Professor at the Department of Arts of the Federal University of Mato Grosso, and collaborator professor at the Graduate Music Studies Program of the Institute of Arts at the State University of Campinas. He earned his Ph.D in Music Composition at UNICAMP, with a research stage at the Centre de Recherche Informatique et Création Musicale (CICM) of Paris 8 University, and he completed a postdoctoral research at NICS-UNICAMP, funded by FAPESP. His compositions have been played in many international events and festivals.

David Friedrich

David Friedrich is a PhD student at the University of Western Australia (Conservatorium of Music). His research is primarily focused on the investigation of (auditory) media technologies and is driven by an interdisciplinary approach between art, science, and philosophy. During his undergraduate studies (2018) in musicology and media studies at the Humboldt University Berlin, he developed the Theremin for the Deaf, probably the first musical instrument that generates sound without acoustics. In his master's thesis (2021), *The Duality of Sound*, at the department for media theory at the Humboldt University Berlin, he challenged our understanding of sound. Whereas the Duality of Sound investigated the influence of an external media technology on the human being and vice versa, his PhD thesis, *Phenomenology of Bionic Sensation*, will go a step further by exploring the relationship between the sensation of sound via the implanted media technology CI and the human perception techno-philosophically.

Dimitris Andrikopoulos

Dimitris Andrikopoulos studied composition at the Rotterdam's Academy of Music and Dance with K. de Vries. He collaborated with various ensembles and orchestras such as the Athens State Orchestra, Orchestre National de Lorraine, Nederlands Ballet Orkest, Ensemble Emanon, Mondriaan Quartet, Drumming Percussion Group, Remix Ensemble, Asko Ensemble, ArtéFacts Ensemble among others. His works have been performed in Greece, Netherlands, Portugal, Belgium, France, England, Norway, Germany, Lithuania, United Arab Emirates, United States, Colombia, Mexico among other resulting from commissions of artistic organizations such as Fonds for the Creative Arts (Holland), Flanders Festival, 1st Cello Biennale/Proms od Amsterdam, Guimarães 2012 /European Capital of Culture, Onassis Foundation, among others. From December 2021 Dimitris has been invited as Research Visiting Scholar at the New York University Abu Dhabi (NYAD). From September 2004 he is teaching composition and composition related subjects in the School of Music and Performing Arts of Polytechnic of Porto.

Gonçalo Gato

Gonçalo Gato was born in Lisbon, Portugal. His works have been performed in the UK, Canada, Germany, France, Portugal and Brazil. The recent CD *NowState* (2020) was released by the

prestigious label KAIROS. He was one of the Panufnik Composers associated with the London Symphony Orchestra in 2016–17, subsequently becoming Young Composer in Residence at Casa da Música. He is active in the field of computer-assisted composition, after completing his doctoral degree at the Guildhall School of Music and Drama under Julian Anderson's supervision. This research led to a chapter in the OM Composer's Book 3 (2016), published by IRCAM.

Gustavo Penha

Gustavo Penha was born in Sao Paulo, Brazil. He took his Bachelor's degree (2009) in Musical Composition at FASM, where he studied with Sergio Kafejian and Paulo Zuben. He got his master's (2011) and his PhD (2016) degrees in Music at UNICAMP, supervised by Silvio Ferraz and with FAPESP scholarship, which also contributes to his studies at the University Paris 8 with José Manuel López López, Anne Sedès and Alain Bonardi (2013-2014). His compositions have been performed at several events and festivals in Brazil and abroad, as England, Italy, France and Canada. In 2017, he made post-doctoral research at USP with CNPq scholarship. Since 2016, he is professor and researcher at the UFMS (Federal University of Mato Grosso do Sul), with CNPq research support. He is also composer and theorist of the Duo Amálgama, with the violoncellist Sandra Tornich, since 2010.

Henrique Portovedo

Henrique Portovedo was awarded with a Summa Cum Lauda PhD in the field of Science and Technology of the Arts (Performance and Computer Music) at the Portuguese Catholic University funded by FCT. Portovedo was Fulbright Researcher at the University of Santa Barbara California, Erasmus Researcher at the University of Edinburgh, visiting researcher at the ZKM Karlsruhe and visiting researcher at McGill University Montreal. Master in Music Performance with Distinction by Trinity Laban London and Master in Music Pedagogy by the University of Aveiro, he was awarded with several prizes including by the Portuguese National Centre of Culture and the British Society for Education Music and Psychology. As saxophonist and intermedia artist has presented multidisciplinary creations in festivals worldwide, while being soloist with some of the most relevant contemporary ensembles in Europe. Currently Portovedo is professor at University of Aveiro, Guest Professor at the Real Conservatorio Superior de Musica de Madrid and coordinator of the Creation, Performance and Artistic Research's group at INET-md.

João Coimbra

João Coimbra Studied Journalism, Jazz, Drums, and Piano. Did his master's in Theory and Composition at Porto Superior Music School. Currently, he is doing his Ph.D. in Composition at Aveiro University, funded by FCT. His work has been published internationally by labels such as EMI, Universal, Sony Music, and Manners McDade and has received commissions from DG Artes, RTP, Antena 3, Porto City Council, SPA, and GDA, among others. The use of the studio as a composition tool using acoustic, analog, and digital instruments have been the basis of his artistic practice and research, a process that promotes the interaction of its elements to favor composition through timbre as musical material. In 2020, he released VIBRA, a project whose main objective was to combine the volumetry and geometric idiosyncrasies of pivotal Porto's spaces – Casa da Música, Fundação de Serralves, Metro do Marquês, Rio de Vila – in the composition of musical pieces.

João Ricardo

João Ricardo (1993, Portugal) holds a master's degree in Musical Arts from Faculdade de Ciências Sociais e Humanas, Universidade Nova de Lisboa (FCSH/UNL) since 2019. He studied composition and analysis with Luís Soldado and attended workshops and masterclasses with Michelle Agnes Magalhães, Jaime Reis, Vincent Debut, Ake Parmerud, Hans Tutschku, among others. His operas were premiered by Inestética Companhia Teatral, Quarteto Contratempus and Operafest Lisboa, and he was the Composer in Residence at Orquestra de Câmara de Cascais e Oeiras for the year 2022. He works regularly with AREPO – Associação de Ópera e Artes Contemporâneas, in score engraving and technical assistance, and is affiliated researcher with Centro de Estudos de Sociologia e Estética Musical (CESEM) since September 2019, and within Grupo de Investigação em Música Contemporânea and Linha de Estudos de Ópera.

Joevan de Mattos Caitano

Joevan de Mattos Caitano serves as Kantor in the Evangelical-Lutheran Church of Saxony, district of Löbau-Zittau. He has been promoting Brazilian jazz performances in church concerts in Saxony as a pianist, organist, composer, and arranger. He is an independent musicologist who previously received a DAAD scholarship to pursue his doctorate at the Hochschule für Musik Carl Maria von Weber in Dresden under the guidance of Prof. Dr. Jörn Peter Hiekel. He is currently conducting research on Darmstädter Ferienkursen für Neue Musik from a global perspective with the assistance of the Internationales Musikinstitut Darmstadt. Additionally, he has been conducting a study on how Johann Sebastian Bach was received in Brazil. Important Journals such as *Archiv für Musikwissenschaft*, *Zeitschrift für die Musikforschung*, *Zeitschrift für Australienstudien* / *Australian Studies Journal*, *New Sound International Journal of Music*, *ICTUS the Journal of Music*, *Revista MusiMid*, *Journal Music Academy*, and *Glissando Magazine* have published his articles. Since 2014, he has spoken at conferences and symposiums in Berlin, Prague, London, Ljubljana, Tartu, Lisbon, Sydney, Spain, and Brazil. He also participated passively in the Festival two days and two nights in Odessa in April 2017 and the Quinquennial Meeting of the International Musicological Society in Athens in August 2022. He is also a member of the Gesellschaft für Musikforschung (GfM) - Music Research Society in Germany.

Jorge Sousa

Jorge Sousa holds a master's degree in New Technologies of Contemporary Music: Creation and Performance from Real Conservatorio Superior de Música de Madrid, a Master's degree in Music Education from University of Aveiro and a Bachelor's degree from ESMAE – School of Music and Performing Arts – Oporto (Music Performance – Saxophone). Currently, he teaches at Academia de Musica de Costa Cabral, in Oporto, and at Espinho Professional School of Music. Besides, he is a member of the Portuguese Symphonic Wind Band and of the Symphonic Wind Band ARMAB. He is attending the PhD program in Music at University of Aveiro (1st year student). He is endorsed by Henri SELMER Paris Saxophones.

Julian Johnson

Julian Johnson is Regius Professor of Music at Royal Holloway, University of London. He was previously Reader in Music and Fellow of St Anne's College at the University of Oxford (2001–7),

and Lecturer in Music at the University of Sussex (1992-2001). Originally a composer, his academic research has focused on issues in music history and the aesthetics of music across the broad period of musical modernity. In 2005 he was awarded the Dent Medal of the Royal Musical Association for 'outstanding contributions to musicology' and, in 2013, became the first holder of the Regius Chair in Music established as part of the Queen's Diamond Jubilee. In 2017 he was elected to a Fellowship of the British Academy and is currently the holder of a British Academy Wolfson Research Professorship for a project titled *The Persistence of the Aesthetic: The Value of Musical Listening in the 21st Century*.

Kenrick Ho

Kenrick Ho is practiced-led PhD composer-researcher at the University of Leeds currently researching in creative opportunities that emerge within the multifariousness of human agencies in AI embodiment through experimental composition.

Leon Steidle

Leon Steidle is Brazilian, master and doctoral student in musical composition at the University of São Paulo under the guidance of Prof. doctor Silvio Ferraz, with a line of research in musical creation processes and Sonology. His research work pays attention to energetic procedures in the musical flow and the relationship between energetic systems from different fields through the concept of allagmatic by Gilbert Simondon.

Louisa Martin-Chevalier

Louisa Martin-Chevalier is Associate Professor in Musicology at Sorbonne University. She teaches Music History, the analysis of XXth century repertoire as well as thematic courses such as 'Music and Politics'. I also co-lead the 'Institutional and Social Contexts' research team (IReMus-UMR 8223) and have been co-directing the committee supervising the journal *Filigrane. Musique, Esthétique, Sciences et Société*. Her current research follows up on the work started for my PhD which focused on the avant-garde Soviet composer Nikolay Roslavets. This research offers an insight into the contemporary artistic creation in Eastern Europe which is largely unknown in France. She is also engaged in several projects of collective research: 'Power Organization in Musical Institutions' and 'From Commission to Musical Creation in Progress'. She is expanding the themes of her research to a broader geographical area that would cover Eastern Europe. She focusing now on contemporary musical creation in Ukraine, Belarus, Poland and Uzbekistan.

Luís Neto da Costa

Luís Neto da Costa received eight Composition awards. In 2017, he was one of the resident artists at Casa da Música and had commissions from institutions such as Arte no Tempo, Festival DME, Portuguese Association of Composers and Antena 2. His music has been played in several Portuguese concert halls and in Madrid, Valencia, Milan, Bordeaux, Larissa, Monterrey, and Rio de Janeiro. Neto da Costa has works included in the albums "LUX ET UMBRA", edited by Artway Records, and "Mixed Dialogues" by Frederic Cardoso. In 2021, a documentary was released about his collaboration with ars ad hoc ensemble. He is also dedicated to Conducting and recorded an album with ESMAE's Contemporary Music Ensemble in 2018. He holds a degree in Composition

from ESMAE and a master's degree in music pedagogy from University of Aveiro. He currently teaches Analysis and Composition Techniques.

Makis Solomos

Makis Solomos was born in Greece and is living in France. He is Professor of musicology at the University Paris 8 and director of the research team MUSIDANSE. He has published many works about new music. His main fields of research are the focus on sound, the notion of musical space, new musical technics and technologies, the mutations of listening, the ecology of sound... His book *From Music to Sound. The Emergence of Sound in 20th- and 21st-Century Music* (Routledge, 2019) deals with an important mutation of today's music. His new book *Towards an Ecology of Sound. Environmental, Mental and Social Ecologies in Music, Sound Art and Activisms* (Routledge, 2023) deals with an enlarged notion of ecology, mixing environmental issues and socio-political questions. He is also one of the main Xenakis' specialists, to whom he devoted many publications. He co-organized, for Xenakis Centenary (2022), the Xenakis22: Centenary International Symposium and he is the editor of *Révolutions Xenakis* (Éditions de l'Œil – Philharmonie de Paris, 2022).

Maria Inês Pires

Maria Inês Pires is a PhD candidate in Historical Musical Studies at NOVA University Lisbon. She completed her bachelor's degree in saxophone and her master's degree in music pedagogy at ESART, in the saxophone class of Professor Carlos Canhoto. She studied at PESMD Bordeaux Nouvelle-Aquitaine, in the saxophone and contemporary chamber music class of Marie-Bernadette Charrier. She won the Best Performer Award in the CRCB Competition (2014), the second prize in the Cabral National Competition (2014) and she was a finalist in the Vitor Santos International Saxophone Competition (2014). Pires participated in the 17th and 18th World Saxophone Congress in Strasbourg and Zagreb. She premiered pieces by young Portuguese composers at the Monaco Electroacoustique Festival (2017, 2019). She has attended masterclasses with Jean-Marie Londeix, Claude Delangle, Vincent David, Lars Mlekusch, Marcus Weiss and Andrés Gomis. Pires was a lecturer at NCMM in 2021 and at EIMAD in 2022.

Marin Escande

Marin Escande was born in Paris (1992). He is a French musicologist. In 2021, he obtained his PhD at Sorbonne University by doing research on the Japanese avant-garde group, Jikken Kōbō (実験工房 Experimental Workshop). Between 2016 and 2018, he was selected for a scholarship program in Tokyo University of the Arts to pursue his research on Japanese artistic scene. Back to Paris for five years, he had been teaching sound creation and contemporary music history at Paris 8 university and is now an associate professor at Lille University. Besides his activities as a researcher, he is also studying music composition in Paris Conservatory (CNSMDP). Through various interdisciplinary collaborations, he has developed an original musical language in relation with environmental soundscape, urbanism and architecture. His music received award from numerous competitions - "Petite forme" (2016), "Sound Spaces" (2019), "Mixtur Barcelona" (2020), "MA/IN" (2021) - and was played in France, Canada, Japan, Taiwan, Russia, Italia, Sweden, Austria and Sri Lanka.

Mark Reybrouck

Mark Reybrouck studied physical education, physical therapy and musicology. He is actually emeritus professor at the University of Leuven (Belgium) and guest professor at Ghent University (Belgium). His interests are interdisciplinary with an attempt to bring together insights from the fields of psychology, biology, semiotics and music. His actual research agenda concerns musical sense-making with a major focus on musical semantics and biosemiotics as applied to music and music and brain studies. At a theoretical level he is involved in foundational work on music cognition and perception, especially the biological roots of musical epistemology and the embodied and enactive approach to dealing with music. Besides this theoretical work, he has been involved in empirical research on representational and metarepresentational strategies in music-listening tasks. He published a considerable amount of papers in internationally reviewed scientific journals and book chapters. He is also author and editor of several books about listening strategies and cognitive strategies for dealing with music as well as edited volumes on musical semiotics and music and brain studies. His most recent contributions cover the field of embodied and enactive cognition and the domains of neuroaesthetics and neuroplasticity as applied to different forms of musical engagement.

Mélissa Mathieu

Mélissa Mathieu holds a degree in Art History and Archaeology (Bac+3) as well as in Musicology (Bac+5) at the University of Aix-Marseille. During her studies, she did two internships, the first in an art gallery, the second in the Locus Sonus sound art research unit (ESSAix). In 2020, she is an exhibition design assistant at the Musée des Transmissions (Cesson-Sévigné) as part of an Army-Youth contract. She worked on the sound project of the new permanent exhibition. After obtaining a "President" contract for interdisciplinarity at the University of Aix-Marseille, she began a thesis on the subject of sonography for museums. In addition, she leads actions within her laboratory as a representative of the doctoral students: creation of a podcast, organization of a study day for the European Days of Archaeology 2023. In parallel to her university studies, she is studying classical music at the conservatory of Aix-en-Provence (accordion, singing).

Monika Karwaszewska

Monika Karwaszewska Polish music theorist, associate professor at the Stanisław Moniuszko Academy of Music in Gdańsk, and editor-in-chief of the Academy's Publishing House. She is a member of the international editorial team of scientific journals published. In 2013 she was granted a doctoral degree in musical arts from the Academy of Music in Cracow, in 2019 habilitated doctoral degree of art at the Karol Lipiński Academy of Music in Wrocław. She is a member of the Musicologists' Section of the Polish Composers' Union and the Association of Polish Artists Musicians. She is the author of the monograph Andrzej Dobrowolski. The Music of Pure Form. Her scientific interest lies in the theory of music of the twentieth and twenty-first centuries, including intermedia and intertextual methodologies. She publishes articles in monographs and scientific journals and is a recipient of the Bronze Cross of Merit awarded by the President of the Republic of Poland for services to Polish culture.

Nariá Ribeiro

Nariá Ribeiro is a Brazilian pianist, music educator and composer. She holds a master's degree in music from Federal University of Rio de Janeiro (BR). She is currently a doctoral student in musicology at Nova University in Lisbon (PT). In 2022 the Foundation for Science and Technology (PT) granted her with a doctoral scholarship. She published the articles: "O conceito de métrica incomum com pulso obscuro de Allen Winold" in the *Anais do 15º Colóquio de Pesquisa do PPGM-UFRJ* and "Phonograph effects, modernism and sound art: a reading (listening) of *O som é um texto desmutado – b-Alúria* (Gabriela Nobre)" in the *Musimid* journal. Her main research interests are 20th and 21st centuries' music, non beat-based rhythm and piano pedagogy. She recorded several works by Brazilian composers such as Tatiana Lima Castro, Philippe Meyohas, Matheus Souza, Caeso e Gabriel Katona. In 2022, she released her first digital album, *MUDA*, by Brazilian experimental label *Música Insólita*.

Nicholas Freer

Nicholas Freer is a guitarist/composer and PhD graduate of the Melbourne Conservatorium of Music. As a musician, he has toured extensively throughout Australia and performed internationally in 13 countries and presented at national and international conferences. In 2022, he received the Conservatorium Director's Award for Exceptional Doctoral Research for his thesis titled *Allan Holdsworth: Principles of Harmonic Organisation in Selected Compositions*.

Nicol Oddo

Nicol Oddo received in 2017 her bachelor's degree in Modern Literature at the University of Catania and in 2019, in the same university, her master's degree in Communication of Culture and Performance with a grade of 110/110 cum laude and a dissertation about Vincenzo Bellini's operatic works through media (radio, cinema and television). In 2019, she was a member of the "Venice Classics" jury at the 76th Venice International Film Festival. Since 2020 she is a PhD candidate in Sciences of Cultural Heritage and Production at the University of Catania with a project about contemporary opera staging practices and the case study of the Italian director Damiano Michieletto.

Nicola Bizzo

Nicola Bizzo gained his degree in History of Music at Università degli Studi di Torino (Italy) in 2003. A composer of music, his studies vary from classical iconographical fonts to contemporary popular music, including many new ways of communication such as video clip and album covers; his last articles are focused on organology in the production of the output of Queen. He has published several articles in international magazines such as "Music in Art," and he is member of several study groups such as IASPM (International Association Study Of Popular Music), AISS (Associazione Italiana Studi di Semiotica), and ICTM (International Council for Traditional Music). He has collaborated in many conferences around the world, as an expert on Queen, and is now part of the Iconography Study Group at the University of Lisbon (CESEM), where he is a researcher.

Niki Zohdi

Niki Zohdi is a composer, tenor and conductor born in Blackburn, England. He completed his music undergraduate degree and composition master's degree at Goldsmiths under the tutelage of Roger Redgate. Niki is currently a practice-led PhD researcher in composition at the University of Leeds supervised by Mic Spencer and Martin Iddon, exploring the concepts of collision and proximity in his music. He has also received tuition in composition from Chaya Czernowin. His music has been performed, workshopped and recorded in the UK, Europe and Israel by the Ligeti string quartet, Carlos Cordeiro, and Seth Josel amongst others.

Paal Fagerheim

Paal Fagerheim is a Norwegian professor in musicology working mainly in popular music studies, music anthropology and ethnomusicology. Research interests include music, space and place, ethnicity and indigenous music cultures, ritualization and performativity, and technology and music production. He has a PhD focusing on Norwegian rap and reggae. Fagerheim is also an active musician and runs a Norwegian music publishing company. He is editor-in-chief of the Norwegian Journal of Musicology, and board member for the Norwegian Music Publishers Association. He is a research partner in the ongoing EU-projects BELEM and Musika Peripherika.

Paula Gomes Ribeiro

Paula Gomes Ribeiro Musicologist. Professor and researcher, affiliated to the Department of Musicology and the CESEM-NOVA FCSH. Lectures in the Department of Musicology of the FCSH since 2005, in the domains of the sociology of music; music and new media; history of contemporary music (1950 to present); opera and music theatre dramaturgy. Received a Ph. D. and a Master degree in Musicology from the Université de Paris VIII after having graduated in Musicology from the New University of Lisbon. She studied music theory, piano, composition, as well opera dramaturgy, stage direction. Serves currently as coordinator of the SociMus (Advanced Studies in the Sociology of Music) and NEGEM (Gender and Music)/CESEM. Specialized in the sociology of music and in opera/music theatre studies, her research interests and publications concern primarily the social, cultural and political roles of music, understood as ordering devices in social life, in the relation music-media of 20th and 21st centuries.

Philippe Trovão

Philippe Trovão was awarded in several saxophone national and international competitions and has presented himself as soloist with wind ensemble and symphonic orchestra in Portugal, Spain and Italy. Master in Pedagogy by the Music School of Lisbon, Trovão develops work in contemporary music, mainly with repertoire of mixed music with live electronics, free improvisation, sound exploration, creation and multidisciplinary projects with theatre and dance as saxophone player or sound artist. His project RECAST, about the recovery of works for saxophone and analogue electroacoustic device, originated his debut album as a solo artist. Currently, Philippe Trovão, is Professor of Saxophone and contemporary music at Conservatório de Música de Santarém and Professor of saxophone at Conservatório Regional Silva Marques, Alhandra. He also is a Doctoral Student at University of Aveiro and currently recording his second album "Sur la Couleur", a monographic of Jean-Claude Risset.

Piotr Kędziora

Piotr Kędziora is a music culture researcher affiliated in the Institute of Cultural Studies AMU, where he defended his PhD thesis *Ambient. Cultures of Listening and Techniques of Sound*, scholarship holder of the Ministry of Culture and National Heritage (Project title: Polish Ambient Music) and the author of the award-winning project *Visualizing the Research Process. The case of Ambient Music Studies* at the "Visualization in Science" symposium (Polish Science Academy, Avant Project). Investigating phenomena of the ambient music and background music and focused on its cultural implications on listening as a cultural practice traced in sociology, anthropology, philosophy, neuroaesthetics, media & communication studies, and sound studies. Author of publications in the field of culture, media and music, co-editor of the volumes *Mediated culture. Research on the Media in the field of Cultural Studies* (2011) and *Music Cultures - Cultures of Listening* (2020). Electronic & generative music enthusiast, film music creator, also WEB developer and programmer.

Renata Kambarova

Renata Kambarova is a professional flautist specializing in contemporary music and multimedia, and an artistic researcher. She is a member of different ensembles of classical and contemporary music, and she is also developing projects including improvisation, electronics and visuals. She is leading an active and promising international career, and has played in many international festivals, such as Biennale de Venezia, reMuisik, or Ars Musica. With the ensemble Fractales she often gives premieres of young and confirmed composers from all over the world. She is currently studying her PhD in artistic research in Anton Bruckner Private University in Linz, Austria, developing projects between Belgium and Uzbekistan.

Ricardo Thomasi

Ricardo Thomasi is Brazilian, post-doctoral researcher in music and technology in National Council for Scientific and Technological Development (CNPq-Brazil) and University of São Paulo (USP-Brazil) under the supervision of Professor Dr. Silvio Ferraz. He is a sound artist fascinated by acoustic resonances and digital filters. His artistic works involve acousmatic music and electroacoustic improvisation, collaborative multimedia performances, video art and interactive art. He is manager of the experimental music label Arte Estranha and teaches workshops on music and creativity to a diverse audience.

Rita Santos

Rita Santos was born in Azeitão. She is a sound artist and researcher, working in the fields of sound art, acoustic ecology, and experimental music. With the proposal *A Segunda Natureza* (2022), she became a grantee of the ou.tra association and developed a sound art installation curated by out.fest- Festival Internacional de Música Exploratória do Barreiro. Currently, she is a graduate student in music sciences, ethnomusicology variant at Universidade Nova de Lisboa, with the dissertation *Lisboa Soa: A festival at the crossroads between sound art, acoustic ecology, and environmental sustainability*.

Roberto Oliveira-Ogando

Roberto Oliveira-Ogando Graduated in percussion at the Koninklijk Conservatorium in The Hague, The Netherlands. Master "in music performance" at the Royal Irish Academy of Music in Dublin, Dublin City University (DCU) in Ireland. Doctoral student at the Universidade de Santiago de Compostela (USC), where does the thesis «Electroacoustic structural processes in Enrique X. Macías» on the figure of the Galician composer. Throughout his career he has given concerts as a soloist, with contemporary ensembles and symphony orchestras, participating in numerous international music festivals. Awarded in the fifth edition of the Premios Martín Códax da Música, he has three solo record works "Pparafusxo" (2010), "Diáspora, novas músicas de aquí e de acolá" (2017) and "Argana, estrutura rítmico española" (2020). Co-founder of ONME Gestión Cultural SL, he is currently a member of the Grupo Organistrum (GI-2025) from USC, and collaborating researcher at the CESEM, FCSH- Universidade Nova de Lisboa.

Roger Cochini

Roger Cochini (1946, Marseille, France) is a French composer of Electroacoustic music. With a musical and scientific background, he is a Engineer in Physics by the National Institute of Applied Sciences of Lyon. He also studied in the classes of Pierre SCHAEFFER and Guy REIBEL as well as at the Conservatoire National Supérieur de Musique de Paris. Being a member of the Groupe de Recherches Musicales (GRM) from 1970 to 1972, and a member of the Groupe de Musique Expérimentale de Bourges (which became IMEB) from 1972 to 1996, Roger Cochini set up a collective electroacoustic music instrument, supporting a pedagogy intended for children and youth. Founder and head of the Electroacoustic Music and Creation Department at the Bourges Conservatory of Music and Dance since 1983, Roger Cochini was a professor at the University of Lille 3 in the Department of Musical Studies from 1996 to 1999, and at the Centre de Formation des Musiciens Intervenant à l'Ecole from 1996 to 2000, and he has also been teaching Sound Arts at the École Nationale Supérieure d'Art de Bourges.

Sara Carvalho

Sara Carvalho is a senior lecturer at Aveiro University, Portugal, and a fellow researcher of INET-MD. She is a composer interested in creative processes associated with gesture, musical narrative, audience as performers and performer-composer collaboration. Her folio has over 70 pieces that are played regularly both in Portugal and around the world. Several of her pieces are available on CD, and in 2012 Numérica edited her monographic CD "7 pomegranate seeds". Several scores are published by the Portuguese Music Information & Investigation Centre (MIC.PT), Babel Scores and Wirripang Pty. Ltd, Australia. She is regularly invited to be part of international composition juries. Her research work is presented at national and international conferences, and is published in different journals and book chapters, such as ASHGATE/SEMPRE Studies in The Psychology of Music Series and London: Imperial College Press. Between 2005-2017 she served as Independent Expert for the "Culture" and "Creative" Programmes (EU).

Sara Pinheiro

Sara Pinheiro (1985) is a sound-maker. For film and video-art, she does sound recording, editing, foley and mixing. In her solo practice, she makes acousmatic pieces, usually for multichannel

performances, radio broadcasts or installations. She is a member of the live-coding group K-o-l-e-k-t-i-v and collaborates with the Bystrouška Sound Studios, in Prague. She graduated in Cinema (Lisbon, 2008) and holds a Master of Music in Sonology (The Hague, 2012), where she is a guest lecturer. She has been part of the teaching committee at CAS – FAMU since 2013. Her academic work is practice-based research under the name of "Acousmatic Foley". She is currently a PhD student at The School of Music and Media in the Bangor University (UK), under the Parry Williams scholarship.

Silvio Ferraz

Silvio Ferraz is Professor at the Music Department of the University of São Paulo. Between 2002 and 2013 he served as Associate Professor of the music department of the Institute of Arts at UNICAMP, in the biennium 2009-2010 was Pedagogical Director of the School of Music of the State of São Paulo and Director of the Campos do Jordão International Winter Festival. Voluntary professor of the graduate program in Music at ECA-USP (2009-2010). Coordinated the Center for Musical Language (PUCSP), the virtual Institute MusArtS (musica articulata sciencia), Núcleo de Integração e Difusão Cultural (NIDIC-UNICAMP) and the Graduate Program in Music at Unicamp (2013). He currently coordinates the ECA-USP/Univeristée Paris 8 Agreement and has participated annually in international congresses as a Lecturer.

Stefano Catena

Stefano Catena is an Italian composer and researcher: he specialises in acousmatic music, ambient and multimedia installation, sound synthesis, spatialisation and sound programming. He graduated at Milan's Conservatory in Electronic Music with the 110/110 cum laude with the thesis "The Virtual Acousmonium: a study on expressiveness of musical gestures". He also studied in the USA at Montclair State University (NJ) with Nathan Davies and at the Hochschule für Music in Detmold with Fabian Levy and Andrea Valle. His works have been included and performed in some of the most important international conferences such as Sound and Music Computing (SMC) and Colloqui d'Informatica Musicale (CIM). He is currently pursuing a PhD in Music, Technology and Innovation from De Montfort University in Leicester under Peter Batchelor, Leigh Landy and Scott Wilson.

Teresinha Prada

Teresinha Prada (Brazilian researcher and classical guitarist) - Bachelor of Music in Performance: Classical Guitar, São Paulo State University (UNESP); Master Degree in Communication and Culture, Latin American Integration Program, University of São Paulo (PROLAM / USP); PhD in Social History, Faculty of Philosophy, Letters and Human Sciences, University of São Paulo (FFLCH / USP); Titular Professor, the Faculty of Communication and Arts, Federal University of Mato Grosso (FCA/UFMT); Classical Guitar Professor at FCA/UFMT and Doctoral Advisor in the Postgraduate Program in Studies of Contemporary Culture (UFMT); Member and Postdoctoral researcher of the Caravelas Research Group, CESEM / UNL; author of the books "Guitar: from Villa-Lobos to Leo Brouwer" (2008) and "Gilberto Mendes: avant-garde and utopia in the southern seas" (2010).

List of Authors (first name)

A	Isabel Pires.....29
André Malhado.....62, 79	J
Ângela da Ponte.....16, 79	João Coimbra.....30, 82
Azadeh Nilchiani.....17, 45, 79	João Dias Fernandes.....29
B	João Ricardo.....32, 83
Basem Zaher Botros Beshai.....23	Joevan de Mattos Caitano.....33, 83
Beata Oryl.....53, 79	Jorge Sousa.....35, 83
C	Julian Johnson.....37, 83
Camila Alves.....82	K
Carlos Villar-Taboada.....18, 80	Kenrick Ho.....39, 84
Caroline Wilkins.....19, 80	L
Christine Esclapez.....29, 45	Leon Steidle.....40, 84
Cláudio Pina.....20, 80	Louisa Martin-Chevalier.....29, 41, 84
D	Luis Neto da Costa.....43, 84
Danilo Rossetti.....76, 81	Luis Velasco-Pufleau.....29
David Friedrich.....21, 81	M
Dimitris Andrikopoulos.....16, 81	Makis Solomos.....29, 45, 85
G	Maria Inês Pires.....47, 85
Gonçalo Gato.....23, 81	Marin Escande.....49, 85
Gustavo Penha.....25, 82	Mark Reybrouck.....12, 86
H	Mélissa Mathieu.....51, 86
Henrique Portovedo. 27, 30, 35, 43, 64, 82	Monika Karwaszewska.....53, 86
I	N
	Nariá Ribeiro.....54, 87
	Nicholas Freer.....56, 87
	Nicol Oddo.....57, 87

Nicola Bizzo.....	58, 87	Roger Cochini.....	13, 90
Niki Zohdi.....	60, 88	Rosalía Martínez.....	29
P		S	
Paal Fagerheim.....	61, 88	Sara Carvalho.....	30, 90
Paula Gomes Ribeiro.....	62, 88	Sara Pinheiro.....	72, 90
Philippe Trovão.....	64, 88	Silvio Ferraz.....	45, 68, 73, 91
Piotr Kędziora.....	66, 89	Stefano Catena.....	75, 91
R		T	
Renata Kambarova.....	67, 89	Teresinha Prada.....	76, 91
Ricardo Thomasi.....	68, 89	29
Riccardo Wanke.....	45		
Rita Santos.....	70, 89		
Roberto Oliveira-Ogando.....	71, 90	39