


Nicolas OBIN

Associate Professor
Ircam, Sorbonne Université
Est. since 1980

Ircam
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I am associate professor (2013) at Sorbonne Université and research scientist in the Sound Analysis and Synthesis (A/S) team at the Science and Technology for Sound and Music laboratory (Ircam, CNRS, Sorbonne Université, Ministère de la Culture). I received in 2011 a PhD. thesis in computer sciences on the modeling of speech prosody and speaking style for text-to-speech synthesis for which I have been awarded by La Fondation Des Treilles. Through the years I have developed a strong interest in the behavior and communication between humans, animals, and robots. My main research area is the generative modeling of complex human productions with various applications in speech synthesis and transformation, multi-modal virtual agent animation, and humanoid robotics. As part of my artistic commitment to Ircam, I am actively promoting digital science and technology for arts, culture, and heritage, and have collaborated with renowned musicians and artists, such as: Georges Aperghis, Philippe Manoury, Pascal Dusapin, Alexander Schubert, Roman Polansky, Philippe Parreno, Eric Rohmer, Leos Carrax, and André Dussolier.

Education and Professional Experience

- [**2022-present**] Head of the Master in Engineering of Intelligent Systems, 80-90 students, Sorbonne Université, Paris, France.
- [**2013-present**] Associate Professor, STMS (Ircam, CNRS, Sorbonne Université, Ministry of Culture) and Sorbonne Université, Paris, France.
- [**2011**] Prix de thèse de la fondation Des Treilles, section télécommunication
- [**2006-2011**] PhD. thesis, MeLos: Analysis and Modelling of Speech Prosody and Speaking Style, Université Pierre et Marie Curie. Supervision: Xavier Rodet (Ircam) and Anne Lacheret (Université Paris Ouest Nanterre - La Défense)
- [**2005-2006**] Master in Engineering ATIAM (Acoustics, Signal Processing and Informatics Applied to Music), Université Pierre and Marie Curie. Major of the promotion.
- [**2006-2008**] Master in Musicology (Musicology, Arts, Aesthetics), Université Paris 8 - Vincennes Saint-Denis . *Pierre Boulez, Franz Kafka: L'écriture de l'irrationnel*. Supervision : Ivanka Stoïanova.

Highlights

Research activities

Supervision	Since beginning	Since 2013	Since 2019
Post-doc	3	3	2
PhD Thesis	9 (+1)	9 (+1)	9 (+1)
Master Thesis	14	13	7

Table 1: Summary of supervised research (since 2008)
(+1) = unofficial

Publications	Since beginning	Since 2013	Since 2019
Journal (int.)	8	7	4
Journal (nat.)	2	1	1
Book	0	0	0
Chapter	5	4	3
Conference (int.)	52	29	18
Conference (nat.)	13	7	1

Table 2: Summary of publications (since 2008)
Int. = international, Nat. = national

[**2022**] International French-Japan Forum Intelligence Augmentation and Amplification + Society (CNRS, EHESS, JST), Paris, France, 2022. <https://www.eu-japan.eu/news/ai-and-social-sciences> This Franco-Japanese summit brings together researchers in artificial intelligence, robotics and social sciences, I was invited to participate as a researcher on the theme "Working Living in a Cyber Physical AI world: which interactions between human being and machine?".

[**2013-present**] Member of organization and scientific committee for the international Workshop VIHAR (Vocal Interactivity in-and-between Humans, Animals and Robots, 2021), SIVA (Socially Intelligent human-like Virtual Agents, 2023, founding member), SSW (Speech Synthesis Workshop, 2023) and Blizzard Challenge (2023)

[**2013-present**] Regular reviewer for the main international conferences and journals in speech and signal processing, e.g., IEEE ICASSP, ISCA Interspeech, EUSIPCO, ISCA Speech Prosody (4 reviews per conference per year in average) and IEEE TASLP, Elsevier Speech Communication, IEEE TAC (2 reviews per year in average)

[**2013-present**] Regular reviewer for the French National Research Agency (ANR): one project every two years in average.

Teaching activities

Teaching Unit	Since 2013	Since 2019
Creation / Transformation	5 TUs	5 TUs
Responsibility	6 TUs	6 TUs
Lectures	7 CM / 6 TD 8 TP / 2 PR	5 CM / 3 TD 5 TP / 2 PR

Table 3: Summary of teaching activities (since 2013)
 CM = lecture, TD = tutorials,
 TP = practical work, PR = project

[**2022-present**] Head of the Master in Engineering of Intelligent Systems, 80-90 students, Sorbonne Université, Paris, France.

[**2022-present**] Head of communications for the Masters in Engineering Sciences (Sdl) at Sorbonne Université

[**2021 - present**] Creation and organization of "Deep Voice, Paris", an annual 2/3-day event bringing together students, the general public, and professionals around voice technologies, combining exchanges, round tables, and technical training on the latest developments in the field of speech and natural language processing.

[**2021**] Founding member of "SOPhIA: association des étudiants de Sorbonne université en Intelligence Artificielle", in collaboration with the Sorbonne Center for Artificial Intelligence (SCAI).

[**2018 - present**] Co-creation, responsibility, and facilitation of the "Deep Learning by Practice" professional continuing education course at Sorbonne University.

Funding

Principal Investigator

[**2021-2023**] Project EMERGENCE Sorbonne Université ReVOLT: REvealing human bias with real Time VOcal deep fakes. Real-time neural voice conversion and its application to the study of human cognition and biases. Total funding: 61.5 k€

[**2019-2022**] Project Ph2D/IDF MoVE: MOdelling of speech attitudes and application to an expressive conversational agent. In collaboration with PSA/Stellantis. Total funding: 110 k€

[**2017-2021**] Project ANR PRCE TheVoice: voice design for the creative industry. In collaboration with: Laboratoire d'Informatique d'Avignon (LIA), Dubbing Brothers. Neural voice identity conversion, voice casting. Total funding: 565 k€

[**2015-2016**] Project EMERGENCE Sorbonne Université ROUTE: ROBot à l'écoUTE, Binaural sound source localization. In collaboration with: Institut des systèmes intelligents et de robotique (ISIR). Total funding: 98 k€

[**2011-2015**] Project FEDER Voice4Games: speech technologies for video games. In collaboration with: ExeQuo, Voxler, Whitebirds. Speech levelling and voice casting for acted speech. Total funding: 628 k€

[**2006-2008**] Projet PEPS Automatic learning of a generative model of speech prosody.

Scientific coordination (for Ircam)

- [**2023-2027**] Projet ANR EVA : Explicit Voice Attributes. Head: Orange. Speech generation and manipulation conditioned on the representation of attributes. Total funding: 761 k€
- [**2022-2024**] Projet ASTRID DeTOX : Lutte contre les vidéos hyper-truquées de personnalités françaises. Head: EURECOM. Generation of audio-visual deep-fakes with synchronization of audio and video modalities. Total funding: 300 k€
- [**2022-2026**] Projet ANR PRC BRUEL: Rethinking evaluation methodology of speaker authentication systems. Head: Laboratoire d'Informatique d'Avignon (LIA), in collaboration with: EURECOM, CEA, and Institut National de Police Scientifique (INPS). Generation of adversarial attacks using voice cloning. Total funding: 698 k€
- [**2021-2024**] Projet ANR PRCE EXOVOICES: Virtual story-telling for Children - Expressive and Cognitive aspects of text-to-speech synthesis. Head: Lunii, in collaboration with: Laboratoire de sciences cognitives et psycholinguistique (LSCP). Expressive and context-aware neural text-to-speech synthesis. Total funding: 740 k€
- [**2007-2011**] Project ANR Rhapsodie: A reference prosodic corpus of spoken French. Responsible for speech to text alignment and prosodic labelling.

Participation

- [**2019-2023**] Projet ANR ARS: Analysis and transformation of singing Style. Singing style modelling and transformation. Head: Ircam, in collaboration with: Lutheries-Acoustique-Musique (LAM), laboratoire Passages Arts Littératures, and Flux.
- [**2014-2017**] Project ANR ChaNTeR: Real-time controlled digital singing. Singing voice synthesis. Head: Laboratoire d'Informatique pour la mécanique et les sciences de l'ingénieur (LIMSI), in collaboration with: Acapela Group and Dualo.
- [**2005-2008**] Project RIAM VIVOS: Creation of expressive voices : multimedia applications. Prosody modelling for speech transformation and synthesis.

PhD supervision, progress and defense committee

Supervision

- [**2024-2027**] Diego Andres Torres Guarrin, Conversion neuronale des attributs de la voix, projet ANR EVA, Ecole doctorale informatique, télécommunications et électronique (EDITE).
- [**2024-2027**] Balthazar Bujard, Modèles de couplages entre signaux temporels pour le contrôle de la synthèse sonore, bourse du ministère, Ecole doctorale informatique, télécommunications et électronique (EDITE).
- [**2023-2026**] Téo Guichoux, Génération multimodale du comportement et transfert de style pour l'animation d'un agent virtuel, bourse du ministère, Ecole doctorale informatique, télécommunications et électronique (EDITE).
- [**2023-2026**] Mathilde Abrassart, Conversion neuronale pour la création d'attaques à l'usurpation d'identité, projet ANR BRUEL, Ecole doctorale informatique, télécommunications et électronique (EDITE).
- [**2023-2026**] Théodor Lemerle, Expressive text-to-speech synthesis for storytelling performance, projet ANR EXOVOICES, Ecole doctorale informatique, télécommunications et électronique (EDITE).
- [**2017-2025**] Lisa La Pietra, The independence of the voice from the XXIème siècle. Ethic et aesthetic of the vocal interpretation from Belcanto to artificial intelligence, co-encadrement avec Giordano Ferrari, Université Saint-Denis, 2017.
- [**2019-2022**] Clément Le Moine, Neural conversion of social attitudes in speech signals, collaboration with Stellantis, programme doctoral Ph2D/IDF, Ecole doctorale informatique, télécommunications et électronique (EDITE), 2019. **Defended on February, 27, 2023**
- [**2019-2022**] Mireille Fares, Multimodal expressive gesturing with style, STMS/ISIR, programme doctoral AI @ Sorbonne Université, Ecole doctorale informatique, télécommunications et électronique (EDITE), 2019. **Defended on February, 15, 2023.**

[2019-2022] Killian Martin, Cognitive control of Rooks' vocalizations, STMS/UMR Physiologie de la Reproduction et des Comportements, ED 549 Santé, Sciences Biologiques et Chimie du Vivant, Université de Tours, 2019. **Defended on December, 13, 2022.**

Supervision (unofficial)

[2013-2016] Olivier Migliore, Analyzing the musical prosody of French punk, rap, and ragga (1977-1992) à l'aide de l'outil informatique, Université Montpellier 3 (PhD in musicology, ED 58 Langues, littératures, cultures, civilisations).

Member of follow-up and defense PhD committee

[1] Marco Fiorini (2024). Instruments co-créatifs pour l'interaction musicale improvisée (2023-2026), direction : Gérard Assayag (STMS, Ircam), Ecole doctorale informatique, télécommunications et électronique (EDITE) (ED 130). Member of follow-up committee.

[2] Nicolas Dahan (2024). Evaluer la qualité de la traduction des documents scientifiques (2023-2026), direction : François Yvon (MLIA, ISIR, Sorbonne Université), Ecole doctorale informatique, télécommunications et électronique (EDITE) (ED 130). Member of follow-up committee.

[3] Sahar Hussein (2024). Reconnaissance des locuteurs à partir de la dynamique faciale (2022-2025), direction : Jean-Luc Dugelay (EURECOM), Ecole doctorale informatique, télécommunications et électronique (EDITE) (ED 130). Member of follow-up committee.

[4] Alexandre Libourel (2024). Lutte contre les vidéos hyper-truquées de personnalités françaises (2023-2026), direction : Jean-Luc Dugelay (EURECOM), Ecole doctorale informatique, télécommunications et électronique (EDITE) (ED 130). Member of follow-up committee.

[5] Sewade Ogun (2024). Generating diverse synthetic data for ASR training data augmentation (2021-2024), direction : Emmanuel Vincent et Vincent Colotte (INRIA, Université de Lorraine), Ecole doctorale Mathématiques, Télécommunications, Informatique, Signal, Systèmes, Électronique - Université de Lorraine (ED 77). **Reviewer.**

[6] Olivier Zhang (2023). Méthodes neuronales d'analyse et de synthèse multi aspects et leurs applications à la voix (2020-2023), direction : Nicolas Gengembre Olivier Le Blouch (Orange), Ecole doctorale Informatique Automatique Electronique Electrotechnique Mathématiques (IAEM) - Université de Rennes (ED 601). **Reviewer.**

[7] Daniel Molina-Villota. Effets Audio Numériques Interactifs et Style Vocal, thèse de doctorat (2020-2024), financement projet anr ArS, direction : Christophe d'Alessandro (LAM), Ecole doctorale Sciences mécaniques, acoustique, électronique et robotique de Paris (ED 391). Member of follow-up committee. **Jury member.**

[8] Mathias Quillot (2022) Un premier pas vers la caractérisation de l'information véhiculée par les voix actées, Laboratoire d'Informatique d'Avignon, thèse de doctorat, Ecole Doctorale Agrosiences et Sciences (ED 536). **Jury member.**

[9] Matthieu Kirchmeyer. Domain generalization for classification and spatio-temporal dynamics, thèse de doctorat (2019-2022), financement : CIFRE Criteo, direction : Patrick Gallinari (LIP6) et Alain Rakotomamonjy (Criteo), Ecole doctorale Informatique, Télécommunications et Electronique de Paris (ED 130). Member of follow-up committee.

[10] Paul-Gauthier Noé. Learning an interpretable speaker representation for attributes manipulation, thèse de doctorat (2019-2023), financement projet ANR - JST VoicePersonae, direction : Jean-François Bonastre (LIA), Driss Matrouf (LIA), Ecole Doctorale Agrosiences et Sciences (ED 536). Member of follow-up committee.

[11] Théis Bazin. Spectrogram inpainting for interactive generation of instrument sounds, thèse de doctorat (2019-2023), financement : CIFRE Sony CSL, direction : Mikhail Malt (STMS), encadrement : Gaëtan Hadjeres (Sony CSL), Ecole doctorale Informatique, Télécommunications et Electronique de Paris (ED 130). Member of follow-up committee.

[12] Andrea Vaglio Automatic lyrics transcription, thèse de doctorat (2018-2021), financement : CIFRE Deezer, Télécom ParisTech et Deezer, direction : Gaël Richard (Telecom ParisTech), Romain Hennequin (Deezer), Ecole Doctorale de l'Institut Polytechnique de Paris (ED 626). Member of follow-up committee.

[13] Giacomo Valenti (2018) Efficient and secure recognition of multiple speakers for mobile devices, authentication, personalisation and contextualisation. CIFRE PhD thesis, Eurecom and NXP Semiconductor. **Jury member.**

[14] Neil Zeghidour, Toward unsupervised speech recognition. Learning of informative and invariant representations. CIFRE PhD thesis, LSCP, Paris Sciences et Lettre / Ecole Normale Supérieure and Facebook A.I Research, ED Cerveau, cognition, comportement. Member of follow-up committee.

[15] Olivier Migliore (2016). Analyzing the musical prosody of French punk, rap, and ragga (1977-1992) à l'aide de l'outil informatique, Université Montpellier 3 (PhD in musicology, ED 58 Langues, littératures, cultures, civilisations). **Jury member.**

Teaching

Since 2022, I am **Head of the Master of Engineering in Intelligent Systems** at Sorbonne Université (Master 1 = around 40 students, Master 2 = around 40 students). This includes students following initial or dual training.

Bachelor's degree (science et technologies, Sorbonne Université)

[2017-2022] Python programming, *Licence 1*, : TD, TP (38h)

[2015-2023] Orientation and Professional Integration, *Licence 1* (30h)

[2015-2020] Signals and systems, *Licence 3*, : TD (10h)

Master's degree (engineering, Sorbonne Université)

[2020-present] Biometrics (with IDEMIA compagny), *Master 2* : **responsible** (2020-), CM (2h), TP (4h).

[2018-present] Advanced machine learning, *Master 2* : **co-responsible** (2020-), CM/TP (14h), project (20h)

[2015-present] Advanced audio processing, *Master 2* : **responsible** until 2019, CM (10h), project (20h)

[2014-present] Collaborative student project, *Master 2* : **co-responsible** (2020-) project monitoring (10h)

[2013-2019] Information theory, *Master 1* : **responsible** (2013-2019), CM, TD, TP (30h)

[2013-present] Digital signal processing, *Master 1* : TD, TP (26h)

[2013-present] Audio signal processing, *Master 1* : **responsible** (2013-2019), CM, TP (22h)

Professional continuing education (Sorbonne Université)

[2018-present] Deep learning in practice: 3 days formation, **creator, co-responsible and instructor** (21h). Six sessions.

External interventions

[2016-2020] Music Technology Program, *Licence*, New-York University (1h)

[2015-2020] Job meetings, *Terminal S*, Lycée Saint-Cyr et autres (1h)

[2014-2020] Human voice and his challenges, *Engineering school*, Télécom ParisTech (1h)

Community engagement

[2022] **Member and Ircam representative at Le Voice Lab**, the French association for voice technologies. <https://www.levoicelab.org/>

[2021] **Founding member of SOPHIA**, the Student Association in Artificial Intelligence of Sorbonne University, with the support of the Sorbonne Center for Artificial Intelligence (SCAI) <https://sciences.sorbonne-universite.fr/associations/sophia-association-etudiante-intelligence-artificielle-de-sorbonne-universite>

[2021] Member of the selection committee for the associate professor position at Ircam/ISIR-Sorbonne Université on "artificial intelligence for robotics or virtual reality" (section 61)

[2020-present] Founding member of the French community on "Culture and Artificial Intellingence", kick-off on 2020, March, 25, Paris

[2019-present] Member of GdR in TAL Traitement automatique des langues, STMS lab. representative

- [2018] STMS lab. representative for the AI commission and strategy at Sorbonne Université
- [2017-present] Member of the scientific council of the engineering UFR at Sorbonne Université
- [2017] Member of the selection committee for the associate professor position at Ircam-UPMC on multi-physical systems and sound signals (section 60-61)

— Awards and distinctions

- [2011] Best PhD thesis award, Fondation Des Treilles.

— Organization of conferences, seminars, workshops...

- [2027] **ISCA Interspeech, organizing committee**, Sao Paolo, Brazil, general chairs: Plinio Barbosa and Sandra Madureira. Around 700 participants.
- [2023] **ISCA Speech Synthesis Workshop (SSW) and Blizzard Challenge** on Text-to-Speech Synthesis, **organizing committee and technical chair**, Grenoble, France, in collaboration with the GIPSA lab (Grenoble) and the IRISA (Rennes). Around 80 participants.
<https://ssw2023.org>
- [2023] **IEEE workshop on Socially-Interactive Virtual Agents (SIVA), organizer and program chair**, Hawaii, USA, as a satellite event of the IEEE International Conference on Automatic Face and Gesture Recognition (FC) and IEEE/CVF Winter Conference on Applications of Computer Vision (WACV).
<https://www.stms-lab.fr/agenda/siva/detail>
- [2022] **Deep Voice, Paris 2022. Second edition: diversity and inclusion in speech technologies**. Annual scientific event on artificial intelligence and speech technologies. 3 days with 6 sessions (keynote, round table, discussion) involving around 20 international speakers (French and English), and 2 technical workshops on neural speech recognition and neural language models, Ircam in collaboration with the Sorbonne Center for Artificial Intelligence (SCAI) and fully part as a scientific event during the Manifeste Ircam musical festival.
<https://www.sorbonne-universite.fr/evenements/deep-voice-paris>
- [2022 -] **Fast-Forward meetings** between research, innovation, and sound design for cinema. **Founder and organizer**, in collaboration with the HAL-audio collective of French sound design artists, Paris France.
<https://forum.ircam.fr/agenda/soiree-fast-foward>
This event proposes a progressive format for inter-community exchanges between research scientists and engineers, and sound designers and artists in order to think and create the sound of the future. This event has a form of informal meetings and discussion, tutorial and masterclasses on the latest advances in sound research and technologies for creative purposes (3/4 times a year).
- [2021] 3rd International Workshop on Vocal Interactivity in-and-between Humans, Animals and Robots (VIHAR), **organizing committee and technical chair**, Paris, France. About 30 participants.
<https://vihar-2021.vihar.org/>
- [2021] **Deep Voice, Paris 2021. First edition: diversity and inclusion in speech technologies**. Annual scientific event on artificial intelligence and speech technologies. **Creation, and organization**, 2 days keynote, round-table, and 2 technical workshops on neural speech synthesis, Ircam in collaboration with the Sorbonne Center for Artificial Intelligence (SCAI)
- [2019] **Sound Design Days (SDD 2019). Co-founder and co-organizer**, 28-29 november 2019, Ircam, Paris, France. Around 120 participants.
<https://www.ircam.fr/agenda/sound-design-days/detail/>
- [2018] Living Lab Supramuros, Avignon theater festival, TheVoice project, 2019 : supervision.
- [2019] Speech, Music and Mind Workshop (SMM 2019) : member of the scientific committee.
- [2018] Living Lab Supramuros, Avignon theater festival, invited speaker, TheVoice project, 2018.
- [2018] "Workshop on Detection, Classification, Localization, and Density Estimation of Marine Mammals" (DCLDE 2018) : member of the scientific committee.

[2016] Conference “Journées d’Étude de la Parole” (JEP), 300 people, Paris : member of the organization committee, member of the scientific committee.

[2011] Workshop on "Advances in Speech Technologies", Paris : organizer.

[2010] Journées Jeunes Chercheurs en Audition, Acoustique musicale et Signal audio (JJCAS), Paris : member of the organization committee.

[2008] International conferences EMUS (Emotion in Music and Speech), Paris (France), Campinas (Brazil), Lyon (France) : member of the organization committee, member of the scientific committee.

————— Reviewing

[1] Reviewer for the French Research National Agency (ANR, 2008, 2015, 2017, 2021, 2022, 2023)

[2] Expertise pour l’Agence Nationale de la Recherche et de la Technologie (ANRT, 2018)

[3] Reviewer for the musical residency program at Ircam (2011-2015).

Journals

[1] IEEE/ACM Transactions of Audio, Speech, and Language Processing (2013, 2020)

[2] IEEE Transactions on Affective Computing (2015)

[2] Journal of the Audio Engineering Society (JAES, 2021)

[3] Elsevier Speech Communication (2015, 2018 × 2, 2020, 2021), 2023

[4] ACM Journal on Computing and Cultural Heritage (2017)

[5] PLOS ONE (2019)

[6] Journal of the Acoustic Society of America (2019)

[7] Acta Acustica (2017)

[8] International Journal of Multimedia Information Retrieval (2017)

[9] Elsevier Biomedical Signal Processing and Control (2015)

[10] Journal of Speech Sciences (2014)

[11] Springer Journal on Language Resources and Evaluation (2012)

[12] Frontiers in Digital Health (2020)

[13] Advanced Robotics (2023)

Conferences

I am a regular reviewer since 10 years for the following conferences.

[1] International Conference on Representation Learning (ILCR), since 2024

[2] IEEE International Conference on Acoustics, Speech, and Signal Processing (ICASSP)

[3] ISCA Interspeech

[4] European Signal Processing Conference (EUSIPCO)

[5] ISCA Speech Prosody

[6] Journées d’Étude de la Parole (JEP)

I also do on demand review for the following conferences: IEEE Automatic Speech Recognition and Understanding Workshop (ASRU, 2021), International Workshop on Detection, Classification, Localization, and Density Estimation

of marine mammals using passive acoustics (2018), International Symposium on Music Information Retrieval (ISMIR, 2017 and 2012), International Conference on Digital Audio Effects (DAFx, 2017),

Implication in artistic projects

I am passionate and deeply committed in the promotion of speech technologies for creation, art, and culture. I have collaborated with renown artists and participated to many productions: composers, musicians, comedians, and film makers (Georges Aperghis, Philippe Manoury, Alexander Schubert, Roman Polansky, Philippe Parreno, Eric Rohmer, Leos Carax, and André Dussolier). Main selection of artistic collaborations:

- [2022 - 2023] *Bestiorobot*, in collaboration with designer Zoe Aegerter and PhD candidate in sciences of information and communication Clothilde Chevet (CELSA). The bestiorobot is an initiative to raise awareness and explain machines and artificial intelligence to classes of children.
- [2023] *L'appel du 18 juin*, reconstitution de la voix du Général De Gaulle, en collaboration avec Le Monde.
- [2022] *Anima*, by Alexander Schubert, Festival Manifeste, Centre-Pompidou (Paris).
- [2022] *Annette*, film by Léos Carax, with sound designer Erwan Kerzanet
- [2022] *L'Hôtel du Temps*, interviews with past personalities hosted by Thierry Ardisson using deep fake technologies. First episode : French comedian and singer Dalida.
- [2019] *Lullaby experience*, by composer Pascal Dusapin, Frankfurter Positionen festival (Frankfurt) and Théâtre 104 (Paris).
- [2018] *Les guerriers de l'ombre*, French documentary directed by Frédéric Schoendoerffer, Canal+. Realistic voice anonymization of secret agents.
- [2014-2015] *Pourquoi j'ai pas mangé mon père*, French movie directed by Jamel Debbouze. Recreation of the voice of the French actor Louis de Funès, by using spectral voice identity conversion.
- [2014-2015] *Juger Pétain*, TV documentary directed by Richard Saada, Planète, France 5. Recreation of the voice of Maréchal Pétain and other French personalities of the second world war, by using spectral voice identity conversion.
- [2013] *Aliados*, opera by composer Sebastian Rivas, Ircam Manifeste festival.
- [2012-2013] *Marilyn*, short movie directed by Philippe Parreno, Fondation Beyeler (2012) et Palais de Tokyo (2013). Recreation of the voice of Marilyn Monroe, by using intonation conversion.
- [2011] *Luna Park*, by composer Georges Aperghis, Agora festival (Paris).
- [2010] *Escort Girl*, first part of the documentary "L'Europe judiciaire" directed by Olivier Ballande, Maha Productions, France Télévision. Realistic speaker anonymization of individuals implied in criminal investigations.
- [2009] *Hypermusic Prologue*, opera by composer Hector Parra, Agora festival (Paris).

Disseminating and popularizing scientific culture

Exhibitions

- [1] "La Voix" exhibition, Cité des Sciences et de l'Industrie, Paris : member of the organization committee, responsible for the realization of three interactive terminals on voice casting and voice transformation, 2014.

Public lectures

- [1] Les enjeux de l'IA dans l'industrie cinématographique. Table ronde avec Mathilde Croze, Festival NUMOK, Bibliothèque François Truffaut, Paris, 2 mai 2024
- [2] L'intelligence artificielle : quels impacts sur la création et les métiers du cinéma et de l'audiovisuel ? Table ronde avec Nicolas Becker, Pierre Lanchantin, Lex Dromgoole, et Erwan Kerzanet, La Femis, Paris, 2 avril 2024.
- [3] Voix et sons à l'ère de l'intelligence artificielle. Table ronde avec Nicolas Muchielli et Erwan Kerzanet, La Cinémathèque française, Paris, 13 mars 2024.

- [4] L'IA au service du sonore ? La semaine du Son, UNESCO, Paris, 18 janvier 2024
- [5] Les usages médiatiques du deepfake : rendre la parole aux morts, une alternative aux archives audiovisuelles ?, Les Rendez-vous de l'histoire, Blois, 6 octobre 2023,
- [6] Ethics and generative AI. Animateur de la table ronde avec Ambre Davat, Patrick Kuban, et Jeannette Gorzala, Speech Synthesis Workshop 2023, Machine that talks, Grenoble, 27 août 2023
- [7] The Sound of Uncertainty, Round table on Music and AI with Nao Tokui and Yotam Mann, Sonar Music Festival, 16 juin 2023
- [8] Entre nature et culture : l'intelligence artificielle pour interpréter un monde de sons, La nature et ses musiques, Exposition et Colloque, Philharmonie de Paris, Jeudi 19 janvier 2023
- [9] La voix humaine: acoustique, signal, apprentissage - de la modélisation à la création, Association des Amis du Laboratoire Arago de Banyuls-sur-Mer, 2022
- [10] La manipulation dans le discours politique : manipulation par le discours et manipulation du discours, Gouverner, Les Napoléons, Val d'Isère, 14 janvier 2022
- [11] Deep fakes audio : entre manipulation et créativité, VoiceTech Paris, Paris, France, 23-24 novembre 2020.
- [12] AI and creativity, Paris-Atlanta webinar, Paris, France, 22-23 octobre 2020.
- [13] Sculpter la voix : algorithmes, IA, et créativité, Sound Design Days, Paris, France, 29 novembre 2019.
- [14] Trucages, deepfake, clonage vocal : en 2020, ne croyez plus vos yeux et vos oreilles, Futurapolis, Toulouse, France, 16 novembre 2019. With Vincent Nozick, associate professor at Paris-Est Marne la Vallée University, and Gueric Poncet, journalist at Le Point.
- [15] Déchiffrée, contrefaite, modifiée : les métamorphoses de la voix, Florence Rosier, Le Monde, 4 novembre 2019.
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