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## ARTICLE

## NODE "MATERIOLOGY AND VARIANTOLOGY: INVITATION TO DIALOGUE"

***Resonaciones: sounds vibrating sympathetically into time and space*****Carolina Arévalo Karl**

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Date of submission: February 2024

Accepted in: June 2024

Published in: July 2024

**Recommended citation**

Arévalo Karl, Carolina; Korintenberg, Bettina. 2024. «*Resonaciones: sounds vibrating sympathetically into time and space*». In: Siegfried Zielinski and Daniel Irrgang (coords.). Node «Materiology and Variantology: invitation to dialogue». *Artnodes*, no. 34. UOC. [Accessed: dd/mm/yy]. <https://doi.org/10.7238/artnodes.v0i34.427747>



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**Abstract**

This article unfolds the research and exhibition project *Resonaciones. An Embrace to Awake*, that originates from an encounter with ancient whistling vessels from the Moche culture from the collection of the Ethnological Museum Stuttgart (Linden Museum). Different forms of knowledge and practices from sound art, new materialism, quantum physics and indigenous philosophies connect within the experiential and experimental setting of the exhibition space. Thus, the potential of curatorial and artistic practice is revealed in forging connections and relations and opening up reflections on philosophical, natural and historical concepts. By reactivating the ancestral technology of whistling vessels, *Resonaciones* explores the vibrational essence of matter and energy, manifested in sound as a medium of connection and agency. Perceiving reality through vibrations, the ontological boundaries between subject and object, between past, present and future, and spatial conceptualizations break down and reconfigure opening up other modes of remembering and relating to one another.

**Keywords**

transduction; sound; vibration; resonance; time; memory; media archaeology; ancestral technology; epistemology

## Resonaciones: sonidos vibrando simpáticamente en el tiempo y el espacio

### Resumen

Este artículo presenta tanto el proyecto de investigación como la exposición Resonaciones. An Embrace to Awake, el cual se origina a partir de un encuentro con unas antiguas vasijas silbadoras de la cultura moche de la colección del Museo Etnológico de Stuttgart (Museo Linden). Diferentes formas de conocimientos y prácticas de arte sonoro, nuevo materialismo, física cuántica y filosofías indígenas se conectan dentro del entorno tanto experiencial como experimental del espacio de la exposición. Por lo tanto, el potencial no solo de la práctica de curación sino también de la artística se revela al forjar conexiones y relaciones que generan de este modo reflexiones sobre conceptos filosóficos, naturales e históricos. Resonaciones, al reactivar la tecnología ancestral de las vasijas silbadoras, explora la esencia vibracional tanto de la materia como de la energía, que se manifiesta en el sonido como medio de conexión y agencia. Al percibir la realidad a través de las vibraciones, los límites ontológicos entre el sujeto y el objeto, entre el pasado, el presente y el futuro, así como las conceptualizaciones espaciales se descomponen y se reconfiguran abriendo otros modos de recordar y de relacionarse entre sí.

### Palabras clave

transducción; sonido; vibración; resonancia; tiempo; memoria; arqueología de medios; tecnología ancestral; epistemología

## 1. Inside the void: when past and future converse

A wave bursts in the Java Sea and spreads across the South Pacific until it reaches the Anzota Caves, south of Arica. Just as the vertical coast of South America turns to the left to open up and begin the geopolitical edge that separates the states of Chile and Peru, the vibration of the wave extends underground through the tectonic plate that reaches the mountains of the Andes, resonating in the void inside Cerro Potosí, a mountain that was left hollow after the extraction of silver during the colonial period and whose material once constituted the centre of its body. What sounds do emerge from the void? The void, in this article, is understood as medium, the void as what is missing, as what is dislocated, the void as wound, the void as the possibility of resonance – of sounding, of dreaming, of healing. Further south, in Pampa del Tamarugal, within another void, where nitrate was extracted for the production of gunpowder and fertilizer at the end of the 19th century, the vibration resonates and the tectonic plates intertwine into permeable membranes. The vibration also resonates in Chuquicamata where the void was left by copper mining since the beginning of the 20th century, and further north, in the Huaca de la Luna in Peru, the place from where a number of Moche whistling vessels that are now (dis)located in the Linden Museum in Stuttgart, Germany, were once taken from the deep layers of the earth. The Moche were a pre-Hispanic society that thrived on the desert north coast of Peru between 200 and 900 CE. Instead of developing a logographic or syllabic system, they elaborated refined encoded artistic records that operate on a highly sensorial dimension through murals, textiles, ceramics and metals that, in combination with architectonic concepts, engender impactful experiences (Muro Ynoñán 2018, 1). These experiential aspects are important to the pro-

ject discussed here, as it revolves around the reactivation of sounds produced by ancient Moche whistling vessels. Following the Bolivian thinker Silvia Rivera Cusicanqui, past and future are contained in the present, “a spiral whose movement is a continuum that feeds back from the past into the future [...] a ‘hope principle’ or ‘anticipated consciousness’ that glimpses decolonization” (Rivera Cusicanqui 2010, 55). In the Andean world, space-length, width-depth, and time-past-present-future were all combined in a single unit to organize events or periods, located within a loop where there is a defined space-time called *pacha*: indissoluble time and space, in vibrational connection in the present and affecting the present, the past and also alternative futures. As the *Quechua* thinker and professor Eusebio Atuq Manga Qespi explains:

“these autonomous space-times are concatenated to form spirals (seen from above) or in a succession of loops or helicoids (seen from the front). And, within each space-time construct, the extended present time arises delimiting an even shorter space-time with its own past, its own present (to generate an *allin kaysay* or ‘good life’ where it is possible to construct with the times at one’s disposal an expected future, which is humanly controllable within the ‘extended present’ itself. This succession of times opened doors of entrance and doors of exit (converging the origin and the consequences of the realized facts or, in other words, the past and the consequences that would be translated as a future), defined by the concepts *urin* and *janan* (antiquity-posterity; woman-male; moon-sun).” (Manqa 2023, translation by the authors)

Bringing concepts of agential realism derived from quantum physics by the theoretical physicist and feminist theorist Karen Barad (2007) into conversation with concepts of Indigenous cosmologies prevalent in the Andean and Amazonian area, the collective research

and exhibition project *Resonaciones* unfolds from the premise of understanding the world in flows of energy and frequencies manifesting in every body alike – in matter across time and space. Being is a continuum of “becoming-with” (Donna Haraway), a dynamic relational mode that means that the ability to act emerges from within a relationship, as Karen Barad frames it in the concept of *intra-action*: “The world is an open process of mattering through which mattering itself acquires meaning and form through the realization of different agential possibilities. [...] This dynamism is agency. Agency is not an attribute but the ongoing reconfiguration of the world. The universe is agential intra-activity in its becoming” (Barad 2007, 141). Thinking about reality as an affective vibrational tissue, *Resonaciones* conceives sound as an important component rendering it perceivable, propagating invisible flows of energy, and connecting bodies on a vibrational level – it touches and engages them. Sound is elusive, dynamic and always site-specific, and resonance is an ever-shifting modality of its articulation. Within sound lies the potential of a transversally connecting time and space through penetrating and affecting matter, provoking a response. The idea of call and response is central and runs through all the dimensions of the project as a conceptual as well as methodological approach. Resonance means “a resonant engagement that acts to intensify relations to one’s material surroundings as a scene of discovery and encounter, a way of knowing” (Labelle 2021, 92). Thus, the project starts from a specific encounter activating sounds from dislocated ancient whistling vessels through experimental, transdisciplinary, and collective practices of art and curation and asks which kind of responses, agencies and forms of knowledge emerge from there. Which voids get activated to resonate, to *re-soñar* (re-dream) and *re-sanar* (re-heal)?

## 2. When sounds of the past touch the present: awakening whistling vessels at the Ethnological Museum

On the way to future-pasts, some of the Moche musical instruments from the Linden Museum were visited in June 2023 by artists Nicole L’Huillier and Francisca Gili, guided by the Mochica healer and cultural activist Karen Urcia Arroyo, to awaken their sounds and frequencies. Whistling vessels are based on a hydraulic technology that developed on the Andean coast of what is now Ecuador and Peru more than three thousand years ago. In Andean cosmologies they are part of the social strata of life; they are entities with agency. These ceramic beings can be activated by blowing into them or by the swaying of liquids inside. For more than two thousand years, this technology was adopted by different pre-Hispanic cultures (Schmidt 2006). The vessels in the Linden Museum collection were brought to Stuttgart in the early 20th century by Carl Sutorius, a German merchant working for the Welck company

in Lima, Peru, who had acquired them at a local art market (Linden Museum, n.d.).



Figure 1. Registering Moche whistling vessels at Linden Museum Stuttgart with an antenna, June 2023

Source: photo by Gabriel Rossell Santillán

The visit to these whistling creatures was an encounter with the Moche ancestors, with their stories, memories and with their energies. They are, as the Peruvian archaeologist Luis A. Muro Ynoñán writes, “sounds personified in clay bodies” (Muro Ynoñán 2023, 26). In Andean cultures, everything lives and exists in a vibrational continuity that connects spaces, times and matter. The past emerged in the present when, gently and patiently, Karen Urcia brought the sounds of six whistling vessels back to life with her own breath, touching them and singing for them. By means of experimental artistic processes, the sounds and frequencies of this encounter were recorded by the sound artist Nicole L’Huillier, with contact microphones and antennae that register electromagnetic frequencies (Figure 1). In these recordings, different layers of sound converge. The contact microphones were positioned on the surface of the clay beings, where the pipe is located. They registered the vibrations and sounds when Karen Urcia projected her breath into the whistling vessels as well as the acoustic dimensions of touch – the touch on the surface by the plate of the contact microphone itself and the contact of Karen touching them (Figure 2). The passive magnetic antenna is a very sensitive instrument that captures ambient electromagnetic fields – in this case picking up the vibrations that constructed the energetic space that dynamically interacted with each whistling vessel, which, in return, was potentially modified by each of the vessel’s material configurations. This multidimensional sound register gave voice to the whistling vessels in their actual “habitat” within and responded to the specific space-time-mattering configuration of the location at Linden Museum, on 28 June 2023, with all the protagonists involved, human and non-human alike. Francisca Gili, a practising artist and a heritage conservationist, examined the vessels with archaeological and anthropological methodologies; she took photographs and made

illustrations, procedures through which she recorded traces that point to the “life” of these creatures, their social context and function.



Figure 2. Karen Urcia activating a Moche whistling vessel at Linden Museum Stuttgart, June 2023. Source: photo by Nicole L’Huillier

a dual sound form from the Andes, by which actions are repeated in a mirrored, opposite, and complementary way (Pérez de Arce 2000). The sound coexists in a dual union, forming an indivisible, sensitive, and responsible relationship mediating opposites, *arca* and *ira*, in which the sonorities that each partiality emits are not equal but irregular to achieve a collaborative, cohesive aesthetic unity (Pérez de Arce 2000). These complement sounds in an intertwined system where unity manifests itself in two reciprocal bodies that produce, receive, resonate, and converge.



Figure 3. Exhibition view *Resonaciones: Remembrance* by Nicole L’Huillier, ifa Gallery Stuttgart 2023. Source: © ifa, photo by Andreas Körner

### 3. Entering a sounding body: the exhibition as a response

The encounter in the museum and the liberation of ancient sounds in the present moment gave impulse to a cascade of reciprocal processes within the artistic and curatorial ensemble comprising Nicole L’Huillier (artist), Francisca Gili (artist and anthropologist), Carolina Arévalo (curator), Bettina Korintenberg (curator) and Karen Urcia Arroyo (Mochica healer and cultural activist). The idea was not to go back to an always imaginary past, but to delve into a shared process and to be affected by perceiving sonic and visual impulses, as well as to form an experience responding to that process. From that shared response-ability – an ability to respond instead of reacting, in the sense outlined by Donna Haraway as a mode of multidirectional relationships (Haraway 2008, 71), sensitivity and attentiveness render the act of perception responsive. From here, processes of transduction and transposition, of confusion and affection, were set in motion, making sonic imaginations emerge into ontological reconfigurations that opened vibrational portals in the exhibition space: an offering, a score, a meeting, a sonic choreography, a space in time. The correspondence and conversation between the works by Francisca Gili and Nicole L’Huillier conceiving the space is a conjuration and can be brought into connection with siku,

With the exhibition *Resonaciones* the ifa Gallery Stuttgart became a hybrid affective body embracing and absorbing whoever entered through its sensitive layers. Inside, sculptures and installations were related in a sonic choreography inspired by characteristics of pre-Hispanic religious architecture, which “were carefully designed to facilitate multi-sensory stimuli and heightened experiences” (Muro Ynoñán 2023, 23). Sound, and its capacity to propel imagination through its impact, was refined in the conceptualization of spaces as soundscapes, as “sonic technol-

ogies were a crucial component of ‘alternative’ world-building” (Kolar 2019, 24). *Remembrance (Indeterminacy Principle)* by Nicole L’Huillier welcomes visitors and prepares the body for the experience that follows (Figure 3). It is a sound bath to empty the human bodies that arrive at the gallery, captured by the overwhelming number of images that we are daily exposed to. A reflective, mirror-like surface distorts the image by vibrating every minute through the whistling sound, a cathartic collective cry of the six Moche vessels recorded in the museum. This cry is an incantation of remembering and “re-membering”, “bringing the members together,” and at the same time, it is a con-fusion and a sonic fiction – never before have all these ceramic bodies sounded together, as the vessels are from different times and locations around the territory of the Huaca de la Luna in Peru, one of the most important ceremonial centres of Moche culture.

After preparing their body for sounds and frequencies to enter, visitors traverse a passage of membranes: three pairs of ambiguous textile images stimulate imaginations of earthly and human bodies merging. *Pieles Permeables* by Francisca Gili amplifies microscopic images of the wounds of the skins of the ceramic vessels encountered in the museum printed onto semi-transparent textiles and, thus, superimposing them to transit through layers towards the interior of the space (Figure 4). The trembling of the earth manifests by moving through these ever-shifting translucent layers. After that passage, a oneiric space opens up: from the ceiling, five ceramic bodies recall the Moche whistling vessels in the Linden Museum (Figure 5). They wear black, the colour of mourning. *Les Vilcas* by Francisca Gili reproduces the technologies of the ancient vessels from the museum and activates memories by making them whistle. The returning sounds are *tara*, a vibrant and pulsating quality sound typical of the Andean festive time, where a constant flow of air is received. The physicist and musicologist Gérard Arnaud argues that there is a common aesthetic in the sounds of the Andes, crystallized in archaeological pieces such as traverse flutes, double whistles and *antaras* up to six thousand years old, as well as in contemporary orchestral instruments such as *tarkas*, *pincuyos* and *sikuris* (Arnaud 2015). The English musicologist Henry Stobart, after conducting studies in communities in the north of Potosí, Bolivia, emphasized that *tara* is not only a sonorous attribute but also a quality of the Andean festive time, when an unrestricted sensorial liberation is generated as an act of surrender and devotion (Stobart 2018). The sounds, the colours, the dancers, the images in procession, and the smells of the food vibrate. All sensory stimuli are saturated to propitiate unique devotional displays. Francisca Gili proposes that vibration is the transversal aesthetic element that facilitates the transfer between bodies and senses, opening space for synaesthesia. A language that activates all the senses is created. Thus, knowledge is a force in movement, inhabiting different bodies, transmuting experiences in the fluidity between containers and contents. Each ceramic vessel of *Les Vilcas* series is connected to a thin tube to blow into, evoking and invoking the activation process of the archaeological whistling vessels (Figure 6) in the Linden Museum. Thus, each person can give their breath to instill life into them, the Andean

*samay*, the vital force and essence of life that circulates in *pacha* and that is shared by the diverse beings that inhabit it, which reveals itself in action when it releases the sounds that enter and change the frequency that we experience together (Przytomska 2020).



Figure 4. Exhibition view *Resonaciones*, ifa Gallery Stuttgart 2023. Source: © ifa, photo by Andreas Körner



Figure 5. Exhibition view *Resonaciones: Les Vilcas* by Francisca Gili, ifa Gallery Stuttgart 2023. Source: © ifa, photo by Andreas Körner



Figure 6. Exhibition view *Resonaciones*, ifa Gallery Stuttgart 2023. Source: © ifa, photo by Andreas Körner



Figure 7. Exhibition view *Resonaciones. Oreja Time Machine* by Nicole L'Huillier, ifa Gallery Stuttgart 20233. Source: © ifa, photo by Andreas Körner

Situated below *Les Vilcas* is Nicole L'Huillier's work *Istrilla Sound System*, a big yellow star/sun sculpture to sit on and equipped with speakers – it is a dynamic sound archive that is called and responds, socializes, changes, nourishes, and contaminates itself. Like a wave that comes and goes, it is a non-linear self-imaginative artefact, a machine learning system. By superimposing and coalescing different sound registers a living sound environment that merges and confuses signals of diverse temporalities and entities is created: ancestral whistles coming from the ancient whistling vessels registered in the Linden Museum, tectonic frequencies from the territory in Peru where the vessels come from, as well as water sounds travelling through the whistling vessels, and even sounds offered by visitors to the complementary part of the work called *Oreja Time Machine (cross-temporal karaoke)*. *Istrilla Sound System* delivers sound dreams that are hybrid responses stemming from a relationship between the artist Nicole L'Huillier, her AI sound collaborator Manaswi Mishra, and the machine learning system itself. Always contaminated, it reflects the present moment of involvement beyond human agency and dissolves the

boundaries between subject and object set by Western ontologies in the confusion of sounds and agencies in intra-action, a collective agency in coexistence (Barad 2007). The idea of a “becoming-with” questions the status of the ontological body in conversation with, among others, Amazonian and Andean cosmologies, which are nurtured by concepts of transcorporeality. This is akin to what Muro Ynoñán, Castillo and Tomasto-Cagigao conclude in their exploration of an ancient Moche cemetery: “Here, the body is no longer perceived as unitary, indivisible and socially constructed, conceptualizations derived from Western epistemologies; but as rather fractal, unstable and changing. Under the lens of this alternative (non-Western) ontology, there is not, and never was, a single body, but a multiplicity of human and nonhuman inhabiting the natural and social world” and so “the body problematizes the traditional paradigms of representation and embodiment” (Muro Ynoñán, Castillo & Tomasto-Cagigao 2019, 116, 117).

The complementary work to *istrilla* is *Oreja Time Machine (cross temporal karaoke)* (Figure 7), a sculpture with a microphone within an enormous steel ear and an LED message that invites visitors to deliver a sound, a sonorous offering that joins the indeterminacy of the machine learning system that operates the sound archive of the *Istrilla Sound System*. Each song is an *illa*, an offering of time and sound, hence the title *istrilla*, a star of *illas*, an entanglement of frequencies and energies that creates sound imaginaries, a timeless junction of intertwined vibrations.

The two *istrilla installations* in the exhibition space perform the *ayni*, the giving and receiving, which is also the principle of Nicole L'Huillier's installation *Labyrinth*, a palpitating organ. Two half-moons are formed by two silvery curtains that act as membranes trembling from the transductions of earthquake data from the coast of actual Peru from 1937 to the present day – sounding vibrations that come from speakers connected to the curtains from below (Figure 8). The composition is the abstraction of a *cañan (Dicrodon guttulatum)* – a reptile species from the Peruvian desert coast – and a *life* – a fish with a semi-circular head and a sinuous body, both profusely represented in the Moche culture. The interior of the installation is the pulse and the inner void that allows resonance and dwells within the membranes and contains the works *Condor*, *Kariñito (+)*, *Kariñito (-)* and *Perceptual Remix (Ojos Sonoros)*. *Condor* evokes the homonymous animal, the sacred bird that connects the *Hanan Pacha*, the upper world, with the *Kay Pacha*, the earthly world. From above, the big speaker emits vibratory frequencies that resonate even in the bodies of the visitors standing in front of it (Figure 9). *Perceptual Remix (Ojos Sonoros)* is composed of three sonorous sculptures that are a reconfiguration of the perceptual organs of the face. They invite us to listen closely to eyes that weep sounds, and to look at the tympanum that shares the shape of a conch shell (Figure 10). Sound is a form of energy transmitted through a medium. As Stefan Helmreich describes it, “often, that energy moves across or between media – from an antenna to a receiver, from an amplifier to an ear, from the lightness

of air to the thickness of water. With such crossings, sound is transduced. The word comes from Latin *transducere*, ‘to lead across, to transfer,’ out of *trans*, ‘across, to or on the farther side of, beyond, over’ + *ducere*, ‘to lead.’” (Helmreich 2015). In the words of Nicole L’Huillier the concept of transduction proposes

“an axis to confront Western notions of music and sound, exploring Southern logics as modes of sonic socialization through an improvisational ritual of a system of call and response. The objective is to think about listening and sonic relationships from transduction proposing a fluid scene, where sound as a form of energy is transformed to exist in distinct planes and dimensions to construct its own meaning in dynamism. This idea opposes the notion of translation, which implicates a colonial process that fragments the signal’s essence, losing part of the content and weakening the message as new meaning is imposed.” (L’Huillier 2021)



Figure 8. Exhibition view *Resonaciones*, ifa Gallery Stuttgart 2023  
Source: © ifa, photo by Andreas Körner

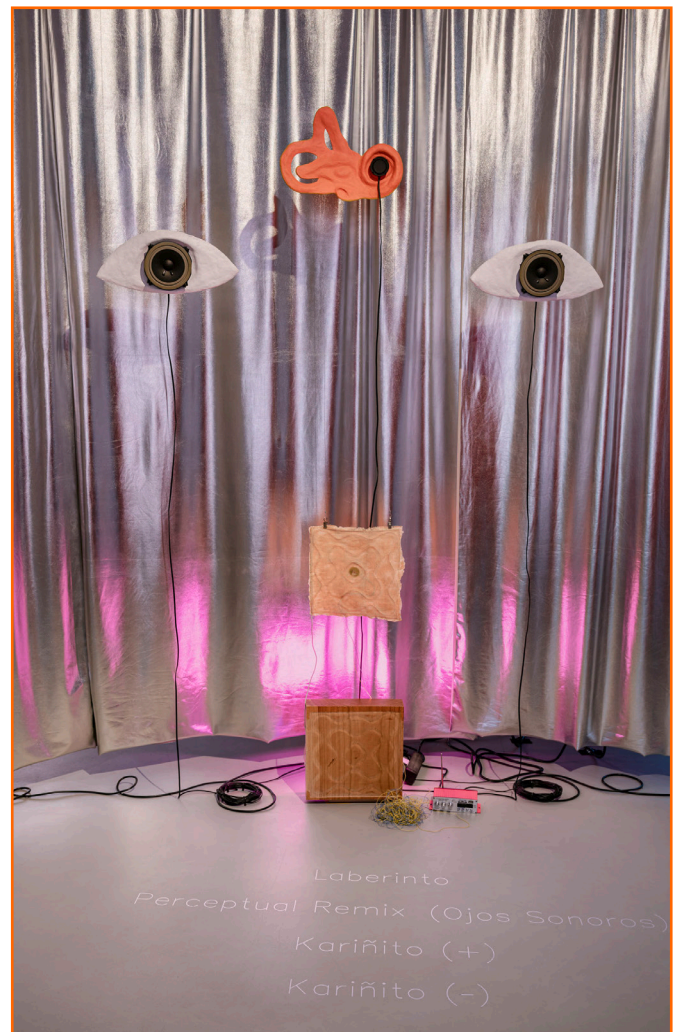


Figure 10. Exhibition view *Resonaciones. Perceptual Remix* by Nicole L’Huillier, ifa Gallery Stuttgart 2023. Source: © ifa, photo by Andreas Körner

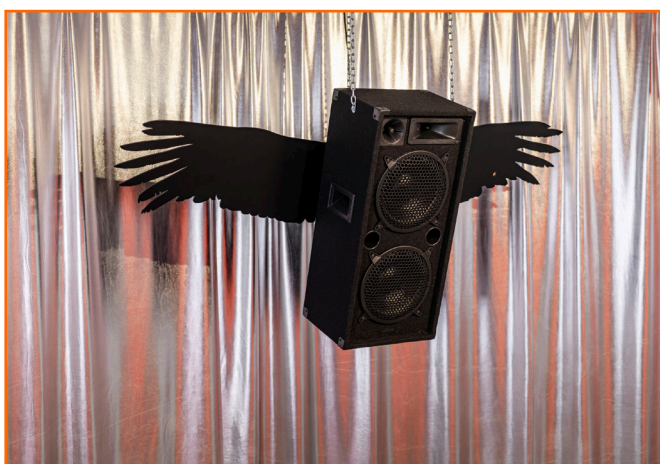


Figure 9. Exhibition view *Resonaciones. Condor* by Nicole L’Huillier, ifa Gallery Stuttgart 2023  
Source: © ifa, photo by Andreas Körner

Transduction, thus, refers to a concept of the *comings* and *goings*, of the transformation of energy in different energetic forms, without separating their existences, but rather conceived in their continuity. *Kariñito (+)* and *Kariñito (-)* are reciprocal and complementary works that transduce tactilely and visually – in carved bas-relief and illuminated relief – the frequencies heard. Sound expands as vibration in different planes and dimensions, sympathetically creating different meanings.

Ceramic, human and geographical bodies are all conduits of vibrations, and water is a medium that spreads and transmits these. Animals, for example, feel primary vibrations that travel twice as fast as secondary vibrations, and which cause most earth tremors (Hayakawa 2019). Stresses that build up along earthquake fault lines release electrically charged particles that are transmitted through rocks producing chemical changes in groundwater (Hayakawa 2019). In a crescent of water, Francisca Gili’s *Cantarino* series reimagines pre-Hispanic whistling vessels, recreating different ancestral technologies that allow

them to sing (Figure 11). It is a language that activates all the senses, which Gili proposes as a sensorial apprenticeship where narratives and invisible stories are activated, opening up possibilities for interspecies communication. The vibrating sound emanating from the vessels and the abstract geometrical designs that dress the bodies open the membranes of each vessel to be inhabited by different essences. The abstract geometrical designs are inspired by the South American shamanic art tradition. It is a deep mathematical knowledge of the laws of symmetry, that is seen in millenary archaeological pieces and in current Andean and Amazonian traditions. They are understood as the embodiment of visions of expanded states of consciousness reached in traditional devotional practices. Also called phosphenes or entoptic images, this type of design corresponds to elemental visualizations of chemical origin, transversal to all humanity and manifested in different artistic expressions, as in the *kené* of the Shipibo, or the stars in Islamic art. As the English-Bolivian anthropologist Denise Arnold points out, “designs in their trans-sensory fluidity can move from one medium to another, be they ceramic, textile, danced or sung” (Arnold 2016, 33). The vibration of these designs facilitates the transmutation of energies (Figure 12). In her series *Illustrated Ethnographies* (Figure 13), Francisca Gili proposes an artistically expanded archaeological methodology as a way of approaching the six resonant ceramic bodies that can be found in the Linden Museum. Drawing is seen as a practice and an opportunity to produce knowledge and learn more about these sound technologies and their specific life trajectory: the currents of air, water and vibration that entice the sounds of these ancient Moche whistling vessels. The drawings, made digitally and printed onto an aluminium composite panel, illustrate hypotheses of the flows and breaths that give voice to these ceramic beings, their technical and formal qualities, as well as their fissures and marks, providing an account of the social life of these migrant ceramic bodies.



Figure 11. Exhibition view *Resonaciones: Cantarino* by Francisca Gili, ifa Gallery Stuttgart 2023. Source: © ifa, photo by Andreas Körner



Figure 12. Transmutation of energies facilitating designs. Source: Exhibition view *Resonaciones: Cantarino* by Francisca Gili, © ifa Gallery Stuttgart 2023

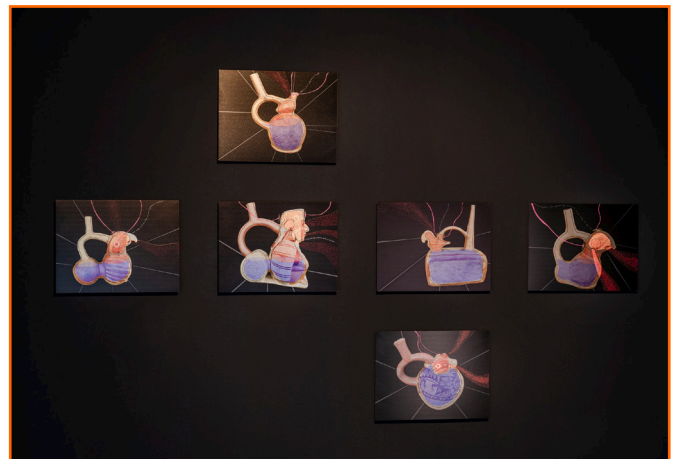


Figure 13. Exhibition view *Resonaciones: Illustrated Ethnographies* by Francisca Gili, ifa Gallery Stuttgart 2023. Source: Source: © ifa, photo: Andreas Körner

#### 4. Can we recover vibratory sensitivity? Resounding practices in constellation

At sunset on 26 October 2023, and in the context of Trueno, the 16th Biennial of Media Arts in Santiago de Chile, a vibrational portal of temporal and spatial connections, was opened to complement the project *Resonaciones*. In Almagro Park, huge boulders stand as a reminder of the unfinished monument to Lorenzo Berg (1924-1984), sculptor, artisan and cultural manager, known as the godfather of arts and crafts in Chile. This is the monument to Pedro Aguirre Cerda (1879-1941), president of Chile (1938-1941), remembered for putting education at the service of popular interests. Fifty years after the coup d'état in Chile that initiated the military



dictatorship (1973-1990), and with many bodies still missing – with many voids and losses – this sound action vibrated where emptiness allowed resonance. Where the great copper flame that was imagined to be at the centre of the fountain of the unfinished monument is missing, a water mirror was installed for the performance to propagate the sound waves coming from two speakers above, that emanate sounds from the *Istrilla Sound System* archive (Figure 14). These sounds began to converse with the sounds of the music group La Chimuchina who research and perform pre-Hispanic sounds and instruments, as well as with ambient sounds – the songs of birds, and the sounds made by trees in the wind and by the people who were there (Figure 15). These sound moments were recorded and fed back into the sound archive of *Istrilla Sound System* at ifa Gallery Stuttgart. The sounds of this living, dreaming and responding machine learning archive that evolves through interventions in different places with different entities will travel back to Peru to awaken memories and to provide impulses for imaginative worlds of coexistence that enable a connection of ancestral time with the now and the future. The gesture of bringing these sounds back to the places of their origin extends discussions about restitution beyond the idea of material objects.

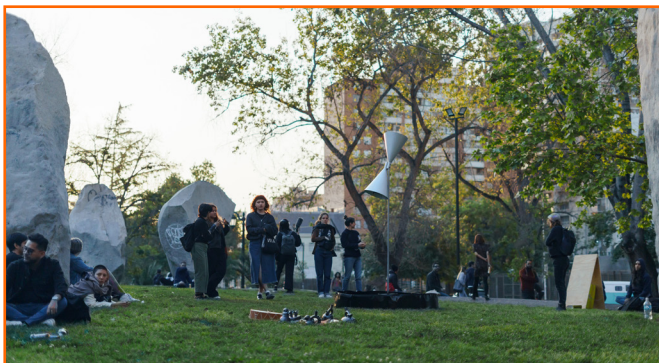


Figura 14. *Resonaciones*: Performance in Almagro Park in the context of *Trueno*. 16 Bienal de Artes Mediales de Santiago. Source: © Bienal de Artes Mediales, photo: Lorna Remmele



Figura 15. *Resonaciones*: Performance in Almagro Park in the context of *Trueno*. 16 Bienal de Artes Mediales de Santiago. Source: © Bienal de Artes Mediales, photo: Lorna Remmele

## Conclusion

The research and exhibition project *Resonaciones* reveals the potential of curatorial and artistic practice in forging transdisciplinary and cultural connections, stimulating reflections on philosophical, natural and historical concepts and thus acting as a worlding practice. The methodology of giving and receiving – or *ayni* as described above – within a shared process in the creation of the project with an ensemble of voices from different disciplines and contexts was key to open up perceptions and practices beyond disciplinary boundaries and thought traditions. Making it possible that Karen Urcia, Mochica healer and cultural activist, could visit the whistling vessels of the museum collection, reconnect with her ancestors' knowledge and history, and guide and accompany the experimental artistic process of activating and registering their sounds, gave voice and significance to the philosophy from the Moche culture within the western codified space of the ethnological museum. This experience initiated conversations between the archaeologists and conservators of the museum with the artists, curators and the Moche healer and activist, opening up and sensitizing for other ways of understanding our existence in time, space and interconnection as a complementary knowledge system. The practice of openness and responsiveness was amplified in the exhibition space through the sound choreography of artworks, that were created by the artists in conversation with the curators after this initial encounter in the ethnological museum. They are transductions of the visual and sonic impacts activated by the ancestral Moche whistling vessels, creating other forms of expression in a connection and disconnection at the same time. Within the visual, sonic and experiential configuration, the machine learning sound archive conceptually takes centre stage within the project: it embodies the dynamic and contaminated quality of vibration, understood as the essence of existence, and it performs the continuity and connectivity of the project. Working on a base of call and response, the archive grows and transforms continuously as it absorbs, fuses and confuses inputs from different temporal and spatial moments. By perceiving reality through vibration the ontological boundaries between subject and object collapse and reconfigure. Through sympathetic resonance, the sound becomes a conduit for agency, allowing us to sensitively engage with other temporalities and reframe our understanding of memory and reality, thus, providing other imaginations of how to live together in the direction of a future nurtured and vibrationally inhabited by the past we cannot disconnect from.

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