

# L'isla des Neumas

Ramón González-Arroyo

## **Presentation**

*L'isla des Neumas* is a sound installation commissioned, realized and premiered in 2007 for the *Sound Dimension* exhibition, curated by José Iges. The exhibition was organized by the *Koldo Mitxelena* museum in San Sebastian (Spain) and was presented in its rooms between June and September 2007.

It comprises seven loudspeakers and a Macintosh computer with a multichannel sound interface box (DACs). The diagram in Figure1 shows the schematic setup of the installation. Four speakers at the vertices of a rectangle much above the height of a standing person (three to four meters), and three speakers, close together, facing inwardly, in the middle of the space and at a height below the waist of a standing person. Ideally, the setup would be that of a room within a room, with ample space between the speakers and the surrounding walls (and ceiling)<sup>1</sup>.

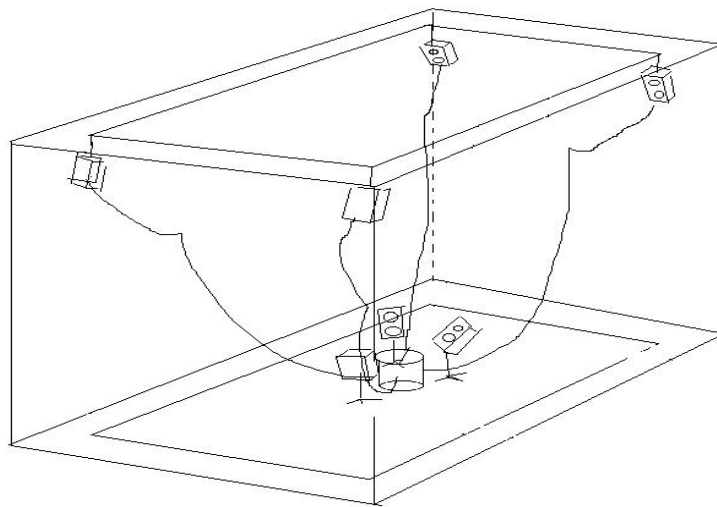


**Figure 1 Schematic setup**

The computer runs a specially built application – *LisladesNeumas.app* –, written in *SuperCollider* (McCartney, CMJ-26, 2002; <http://supercollider.sourceforge.net>), which generates and synthesizes in real-time a continuous, infinite flow of sound structures following a set of compositional rules. Since *SuperCollider* runs in many different platforms, the piece should also run in different systems, but has not yet been tested.

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<sup>1</sup> See further down for more information on the installation characteristics. The extra documentation includes also pictures and schema and a text on performance.

## ***Concept***

The central idea of the piece is to approach sound as a plastic object. Sound is thought as an N-dimensional object (a line, a surface, a volume) evolving in a 3-dimensional canvas – i.e. the inverted irregular pyramid trunk defined by the seven speakers. These plastic-sound objects – spatial sound structures – are “placed” and evolve within the constraints defined by the virtual space created by the speakers. All possible static and dynamic configurations are surveyed : above, in the middle or below, on the outside or the inside, and at any of the planes or lines which the “canvas” defines.

The goal of the piece is to explore the many different perceptual states which could be achieved through these premises. From the perception of a dynamic container, a physical space of changing dimensions “full” of dynamically evolving sound, to the perception of a landscape/soundscape built through several “transparent” planes, to the more pictorial 3-dimensional canvas coloured with different textures and pigments. In extremis, attempting to achieve the perception of a physical presence, of virtual physical objects – embodiments of certain sound structures –, which one could almost touch.

Sound is ubiquitous, but our perceptual mechanisms try to apprehend causal sources behind; they tend to spatially confine and locate and hence to embody as soon as it is believable. If I perceive a sound coming from a speaker, I see the object from where it comes and I assign it as its source, but if I perceive a sound in the middle of the space, in the middle of nowhere so to speak, I might tend to mentally create a source, an invisible physical object, in that region of the space, something that explains that “presence”. It is, naturally, fragile, almost magic.

Two main references need to be mentioned in order to better understand this approach.

On the one hand, the acousmatic concept. Very generally, the acousmatic approach uses a large amount of different types of speakers displayed over a large surface, a stage for instance, in order to perform stereo or few-channel pieces. Though essential to the acousmatic concept, we leave aside the real-time performance aspect, because what interests us in the present case, is that the speakers intrude ostensibly into the physical space (as opposed to the speakers at the surroundings), but that they are not neatly perceived as the sources of sound because the music is being rendered through different speakers at the same time and in constant evolution. The result is that sound flows within the speakers, in the middle of the space, acquiring depth and, so to speak, physicality.

The other reference to be made alludes to the granular approach to sound synthesis. The duality corpuscle-wave in the nature of sound is a salient aspect of the composition of the piece. Granular synthesis is in essence the most flexible approach to any sound concept. It allows evenness as much as rugosity, wave-like as much as corpuscular. And even more, the richness and flexibility achievable on the spatial rendering is extraordinary, for it allows describing the space within the sound.

It is only through the combination of the temporal and spatial aspects of sound, as described within a global space where multiple physical sources interact, that certain structures can be approached.

## ***Installation***

With the conceptual description of the last paragraph, it can be clearly understood that a sound installation was **the** choice for the piece. I wanted “to explore many different perceptual states”, to interact physically with the space in the positioning of the loudspeakers, to create a space which could be explored from different perspectives. Generative music, granular synthesis, pseudo-acousmatic and ... sound installation.

It is a piece completely focused on sound. The visual aspect had to be dimmed, and, indeed, a *comfortable* penumbra (not too dark, but darkish) was almost a must. In the darkness one sees through sound, and in the thresholds of perception, imagination supplies the lacks.

A sound installation, however, is a place, and the visual, or better, the inhabited space plays a fundamental role. Figure 2 shows a representation of the vision I had when imagining the piece. A bluish penumbra, the seven speakers, and the *liana*-cables underlying the island idea, surrounded by an inscrutable darkness.

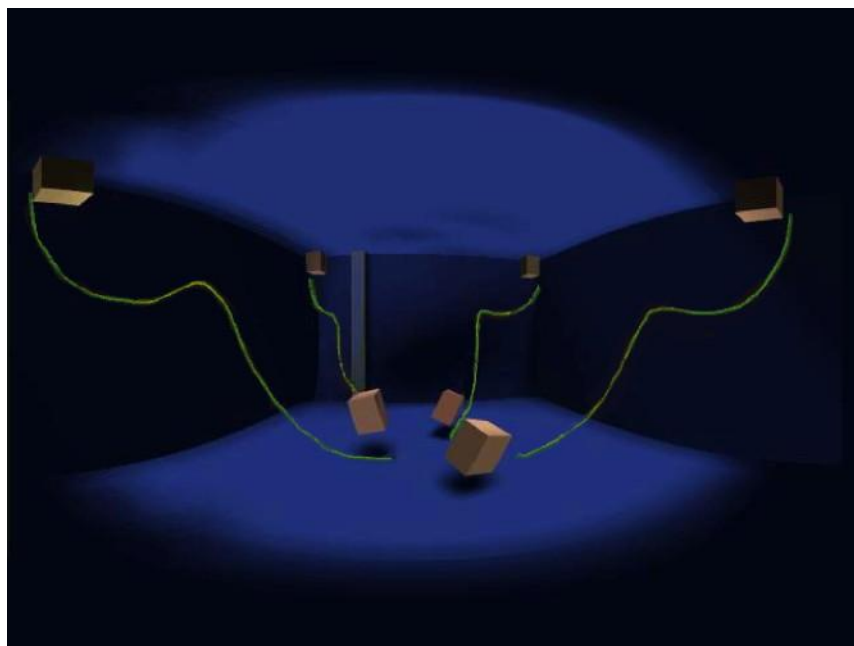


***Figure 2 Visualization of a dream***

From this ideal conception every practical realization has to be derived. It is important to remark that perceptually there is indeed a space within and a space outside – in the figure the blue and the dark –, and it is important that the space “outside the island” exists, because it gives a different and very interesting perspective.

Finally, I must mention, because it is not clear in the figure, that the three speakers from below are so close together that a person cannot go inside. They are supposed to build a place which is “contemplated” from the outside. In other words, whatever is rendered should not be decomposed.

## Composition

To provoke the unpredictable and remain yet within a known world. Suggestive, varied, capable of arising local and global<sup>2</sup> interest.

To an installation one suddenly enters; within, there is no past. We enter *in medias res*, like in the classical epics, and there is a need of time, besides, for the ear to really be able to dwell in the universe with which it is confronted. But from the moment of the entry, however, it has started to build. And on following visits, then there will already be a game of reminiscences and expectations.

The answer to these challenges must not necessarily be the present continuous, the ever-changing enjoyable surface. A pregnant world which helps to “discover” links, relationships and paths is the appropriate environment. To my understanding, the key to the design of the compositional laws governing such type of pieces, to put it in *cagian* terms, is not to know the answers but to formulate the right questions.

In any particular piece, however, certain levels of the compositional laws are biased by mere internal mechanisms. In this case, for instance, the granular approach, which forces the interaction of the different formal levels, extending their realm to the millitemporal level, condition in big measure how and what to formulate.

Atomic colour, and the weaving cohesive laws building up sound, texture; register range, dynamics, density and spatial configuration; static-vs-dynamic behaviour. These are the basic elementary aspects with which the piece is built.

A set of discontinuous streams, defined in slightly different time domains, flow in parallel creating the impression of an overall continuous flux of sound mass. Because of the multi-layering, because of the various speed/duration breadths, it is not difficult, however, to isolate aspects, to create perspectives, to perceive event-like happenings. To build up some kind of form.

Governing these streams there are some logic mechanisms to control their behaviour, which lean on the definition of a set of configurations which apply to one or other or to several of these elementary basic aspects mentioned above. These configurations are better understood when thinking on them as meta-laws, flavours rather than clear-cut states. The mechanisms build up the streams by combining aspects according to some constraining laws applicable to each different stream.

And above them all an “experienced” gambler, throwing dice and betting for some combinatory pattern of meta-configurations.

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<sup>2</sup> In a temporal sense.

## ***Epilogue***

The title of the piece is not in any specific language, or, better said, it is more or less in Spanish but with allowances. However, it's meaning is clear : *The island of the Neumes*.

I have already referred to the idea of island within this text when describing certain aspects of the installation – the room within the room, the wilderness and physicality of its sounding presence, the “lianas” giving visual life to the space, accentuating the within and the beyond. Neuma, however, at least in Spanish, has two different meanings. On the one hand – coming from the Greek πνευμα : breath –, a neuma is a basic element of a musical notation system, a note or group of notes to be sung to a single syllable. On the other hand – coming from the Greek νευμα : movement of the head –, it makes reference to expressions indicated by means of movements or signs, to interjections or sounds with imperfect meaning. I liked this duality, and the implications of both definitions when thinking of those sounds appearing in the piece.

The piece is dedicated to Pepe & Concha (José Iges and Concha Jerez). Their help and support have been essential in the creation of the piece.

L'isla des Neumas will be presented this year, from mid-June onwards, at the Essl Museum at Klosterneuburg (Austria).