

NOTES ON *presence* A Music Installation for Phantom Chamber Orchestra

Joseph Diebes

There are some ideas which, though not inherently musical, are best rendered in musical form. Perhaps because the idea is slippery and requires the fleetingness of music to gain a feeling for it, or perhaps sonification brings the wisp of an idea into a realm where the brain can experience its structure on a more reptilian level. My music installations to this point have had as their genesis an idea or ideas of this sort. One that I have been pursuing for some time is the relationship between communication patterns in their most primal, naturally occurring form (for example between birds, cicadas, or humans), and the seemingly new and technologically mediated modes of communication that are rampantly evolving.

THE PASSERINE SONG CYCLE

About five years ago I composed a piece for player piano called *The Passerine Song Cycle*. I was inspired by a series of frequency/time graphs (spectrographs) plotted from tape recordings of bird songs that I found in a book by the ornithologist Donald J. Borror. I wanted to translate these images back into sonic form, though more readily accessible to the human ear. The player piano was the perfect mechanism for this, as the piano rolls are also frequency/time graphs. I rolled a blank piano roll on the floor and with a marker drew out the contours of the spectrographs. I then punched the holes according to these marks, excluding the notes outside of a particular Japanese scale I wanted to work within. The overall process ran as follows: the original bio-acoustic signal was converted to an electrical signal via microphone, then magnetically imprinted onto tape, then fed through the spectrograph machine where it was plotted on a graph, then mapped geometrically to another two-dimensional visual plane (the piano roll), and finally was read by another mechanical system which rendered the image back into an acoustic signal.

My question was: after all of these translations, conversions of energy, and a successive fixing and releasing of a naturally occurring signal, what becomes of the original message? After repeated listening my feeling is that the technology used did not affect the birdsong in any fundamental way—that is, the message I received

Hudson Square Summer Festival

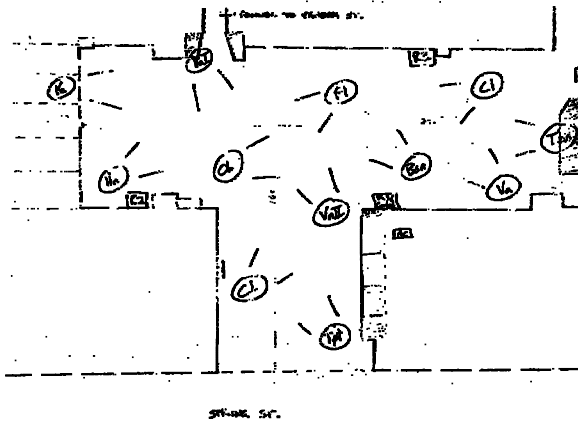
Presented July 11, 2001 by Trinity Real Estate

presence

a music installation for quantum chamber orchestra
in seven sections

by Joseph Diebes (2001)

Please move freely through the space. It is encouraged to experience several different locations during the course of the piece.



Program for the premiere of *presence* at the Hudson Square Summer Festival in New York, 2001.

Score on music stand at the premiere of *presence*. Photo: Courtesy of the artist.



from listening to this piano piece had the same quality to what I had heard listening to birds in the field. Furthermore, it sounded better to me than most piano music I had heard before. This confirmed my idea that certain technologies, if used carefully, could act as more or less neutral translators of natural occurring phenomena into musical terms. I think of the player piano as the first sampler—the first machine capable of rendering a displaced performance—and as such, the progenitor of much of the technology used to compose music today. Since *The Passerine Song Cycle*, I have composed most of my subsequent work on an up-to-date computer-based sampler, including my most recent music installation, *presence*.

presence

FOR PHANTOM CHAMBER ORCHESTRA

presence originated from the intuition that on a very specific plane the communication patterns of primitive species, humans, and computer networks are the same thing, and that this thing is sonorous in spirit. I had a premonition of a society of incorporeal bird-people-computers communicating through auditory signals which, though emanating from individual entities, were radically displaced—having their origin in a future-primordial void.

I also wanted to write an orchestral piece in which I could explore some potential intersections of conventional composition techniques with the revolution that has taken place in the area of digital audio, especially the ability to instantly access any section of a large repository of recorded sound. The process of composing *presence* fell into two discrete phases. First, I wrote the orchestral parts and sampled the performance of each musician separately in a recording studio—this phase only happened once. Second, I composed the piece on a sampler¹ and then presented it in a multi-channel music installation. I can work through this phase an indefinite number of times in order to adapt the piece to new installation contexts.

DESCRIPTION OF PERFORMANCE/MUSIC INSTALLATION

On entering *presence* the audience is confronted by a phantom chamber orchestra. The musicians are twelve loudspeakers (each one playing back a different instrumental part) dispersed freely throughout the installation area, around which the audience is encouraged to wander and experience new auditory perspectives. In one place one may hear the flute directly in front, the french horn farther away and 40 degrees to the right, a viola behind and a little to the left, and the remaining instruments percolating at various distances throughout a 360 degree audio panorama. At another location one might focus on a composite melody created by the trumpet to the left and the clarinet to the right. Or one could continuously move around, creating one's own line through the piece. In front of each speaker/instrument is a music stand with the original sampling part, not linear music but a series of isolated melodic, rhythmic, and textural gestures. Listening to that speaker

FL

presence.

The image shows a handwritten musical score for a flute sampling part. It consists of seven staves, labeled I through VII on the left. The top staff is a single line with notes and rests, including dynamic markings like 'f' and 'mp'. The lower six staves (II-VII) are arranged in a grand staff format, each with its own time signature and key signature. Staff II has a time signature of 3/4 and a key signature of one flat. Staff III has a time signature of 3/4 and a key signature of one flat. Staff IV has a time signature of 3/4 and a key signature of one flat. Staff V has a time signature of 3/4 and a key signature of one flat. Staff VI has a time signature of 3/4 and a key signature of one flat. Staff VII has a time signature of 3/4 and a key signature of one flat. The notation includes various rhythmic patterns, including sixteenth and thirty-second notes, and rests. There are also some handwritten annotations and markings throughout the score.

Flute sampling part from *presence*.

one would be able to pick out some of these gestures, though not in the order they appear on the page. The overall sonic experience is of being immersed in a spatial web of melodic fragments that create composite melodies and textures.

PHASE 1—WRITING THE PARTS, SAMPLING THE PERFORMANCE

I began by writing the orchestral sampling parts without any consideration for the final outcome of the piece—there was no preliminary piano score or conductor's score written beforehand. Each of the instruments was given forty-nine melodic gestures divided into seven species (I–VII) of seven melodies (a–g). These melodies were conceived as a vocabulary of short communicative calls—isolated, inert, ready to be given context in the later composition phase. In addition I wrote five single-note figures to be played on pitches throughout the range of the instrument. The gestures within each species were similar across all of the instruments in the way that different phrases spoken by someone in a foreign language can have a similar cadence or feeling for the listener. For example, except for some adaptations due to the varying agilities of the instruments, the trombone's part in species III was similar in character to that of the flute, or the first violin. As a result, the usual hierarchical arrangement was abandoned in which some instruments, such as the violins, are assigned the thematic material, while other instruments provide harmonic support or punctuation. I wanted to create a range of material that was fragmentary and flexible to combining in a later phase.

For the performance I brought each of the twelve instrumentalists one at a time into a recording studio where, over the course of an hour, we recorded all of the gestures which comprised his or her part. Aside from very approximate tempo markings, I left most decisions concerning articulation to the musician. I wanted performances that were well-differentiated in expression. After the recording sessions, I brought home the audio I had recorded on a CD and spent the next week separating each of the gestures into separate audio files and loading them into my sampler so that I could have instant access to every call, every piece of raw material.

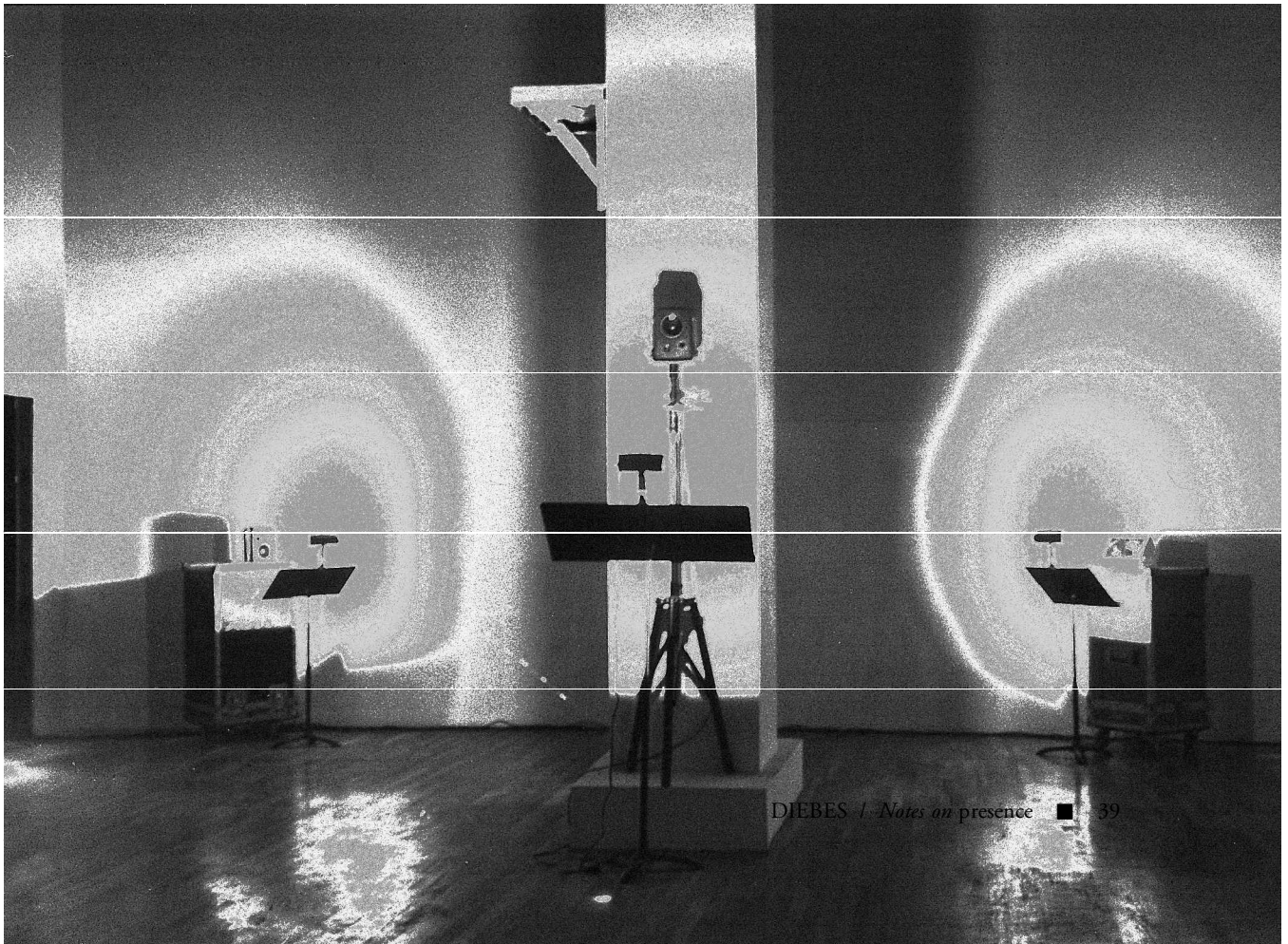
PHASE 2—COMPOSING AND PRESENTING THE PIECE

Before working with the audio I had just recorded, I went to the space where the installation was going to be performed to investigate the acoustics and plot where the various speakers were going to go. It was important that they were placed in a way so as to have a full sound, but a clear sense of localization. I then drew a diagram of the space with precise positions of each instrument. I thought about each speaker as an entity in a society of like entities that had been fixed in space, and that could only interact with each other via the short gestures that I had loaded into my sampler. Later, referring to the diagram, I used the computer to recall samples as needed to create patterns which suggested various relationships among the individual instruments: calling, responding, gesturing together, messaging back and



Performance site for the premiere of *presence*. Photo: Courtesy of the artist.

Installation of a second version, *presence, evolution I (species III)* at GALE GATES et al. in Brooklyn. Photo: Courtesy of the artist.



forth—though I was often unconcerned with sequential relationships. I was not imparting any specific meaning to any of these gestures, basing many of my compositional decisions on the kinetic sensation of hearing specific interactions between various instruments, and more often, the sound of the aggregate whole. Activity could begin to accumulate in one spatial region and disperse into another—concentrations of communicative energy sometimes gathering momentum, sometimes receding, sometimes suddenly materializing with an impulse more organic than systematic. The shapes and forms were intuitive—hopefully pre-conceptual—and the efficiency of the computer allowed me to access this directly.

One thing working in this way allowed me to do, which is more or less inconceivable when writing on paper, is to play back all of the material I wanted to work with at once, so that I was confronted with a cacophonous mass of sound within which every possible gesture was sounding continuously. From here I could whittle away audio until I was left with exactly the density and level of complexity that I wanted. I found myself constantly responding to nuances of the performance—the way the material was articulated by the musician in the recording studio. I found myself throwing out gestures that I didn't like anymore, and duplicating the ones that affected me the most. I lightly ventilated some sections while adding subtle layers in others. In short I found myself working in an intuitive, spontaneous, tactile way that is more readily associated with sculpture or painting than with traditionally notated music.

ONE PERFORMANCE, MANY COMPOSITIONS

The original version of *presence* was presented in a loading dock courtyard at Spring and Hudson Streets in SoHo. Due to the nature of the performance—a one-hour mid-day concert, outdoors in the midst of the theatre of New York—the piece was bound to absorb and be absorbed by other complexes of urban activity. And so I thought of this version as open-ended, leaving space in the music for resonances with the sounds of the traffic, passers-by, and the audience itself. I approached the material non-hierarchically, ensuring that no individual instrument was given more focus in the composition. Also, knowing that the audience was arriving expecting a performance (rather than an installation) I spread chairs asymmetrically throughout the space, facing in different directions so that they were encouraged to watch each other. As it turned out many unplanned things happened which added greatly to the performance experience. At one point twenty members of a kitchen staff in white uniforms sat down on one of the loading docks to eat their lunch and became an integral part of the performance. At another point a man leaned towards a speaker that wasn't playing at that moment, moving his ear closer and closer until a flute melody burst out of the speaker, causing him to spill his drink. Another man pulled out his cell phone, called somebody, and put the phone in front of one of the speakers, vastly opening the system into the wireless network. I counted at least three audience members with portable recording devices—who knows in what future context those recordings might find themselves.

A second version, *presence, evolution I (species III)* took place for one night at the GALE GAtes et al. performance space in Brooklyn. The austerity of this setting, as well as the fact that it was isolated from the city at large, led me to compose something more sparse using only the material from species III. Also, the architecture suggested a more hierarchical arrangement, and so in this version the flute was separated from the other instruments by being placed on a higher platform and, instead of playing through the gestures from species III, emitted one sustained tone for the entire evening while the other instruments interacted more in the manner of the original version. This was much more of a closed system, and so I left the installation in darkness except for the lights on the music stands. This time my favorite part was when everyone had left, and the installation continued to run. No musicians performing for no audience.

My hope is that there will be more evolutions of *presence*. Not fixed into a master score the composition can continue to mutate in response to new environments. I would like to perform it in a situation where I can mix the phantom orchestra live, creating communication patterns in response to the momentary changes of the setting. Other plans involve giving the audience a degree of choice, where they can select different species, or switch the piece between installation and performance modes. I realize more and more that this piece contains multitudes, and that new evolutions reveal new and fertile dimensions of the original impulsive concept.

NOTE

1. "Sampler" in my mind is a dated term as many of its functions have merged with most of the software used to work with audio on a personal computer. However I will use the term to clarify that I was working with small snippets of digital audio that were recorded from primary sources, and that were subject to various audio manipulations.

JOSEPH DIEBES is a composer whose work interfaces with the worlds of contemporary classical and electronic music, as well as performance and visual art. He has composed for groups such as The Living Theatre and The Ontological-Hysterical Theatre, and his works have been presented at The Kitchen and various international festivals. He most recently collaborated with GALE GAtes et al. on their production of *So Long Ago I Can't Remember*; his opera *Strange Birds* premiered there in October 2001.