

Name: Sever Tipei, Computer Music Project, University of Illinois, s-tipei@illinois.edu

Title: figer, for fixed media

Program Notes: **figer**(*fr.*), *vb.* to clot, coagulate, congeal. Realized with DISSCO, software for Computer-assisted Composition and Additive Sound Synthesis developed at the UIUC Computer Music Project and Argonne National Laboratory, **figer** contains elements of indeterminacy at all structural levels. As such, it is a *composition class* or a *manifold composition*: all its actual and potential variants share the same structure, but differ in the way events are arranged in time and details are crafted.

The work includes four disquieting sections, three interludes and a coda; together they suggest an “apocalyptic” picture of surrealist aural images. Similar to paintings born from that aesthetics, it includes recognizable, familiar elements placed in an incongruent context. The coda, a quote from the traditional repertoire, enforces this perception.

In **figer** there are no themes-characters participating in a logical “plot”. Instead various sound objects re-occur in a non-linear, ostensibly random succession and listeners are invited to create their own representations of the proposed sound shapes. New appearances of previously encountered entities are distinct although they all can be identified as being incarnations of three primary types of materials: points, lines, and aggregates/chords.

The work could also be seen as a riddle, the answer to be found in the coda and the title.

Relates to paper: submission 170964, Sever Tipei - “Communicating a World View: figer, a Manifold Composition”.

Venue: evening concert, stereo and 8 channel versions available

Duration: 12 min.

Instrumentation: fixed media, stereo and 8 channel versions available

Composer bio: Sever Tipei was born in Bucharest, Romania, and immigrated to the United States in 1972. He holds degrees in composition and piano performance from the University of Michigan and Bucharest Conservatory. Tipei has taught Composition and Music Theory since 1978 at the University of Illinois at Urbana-Champaign School of Music where he directs the Computer Music Project; he is also a National Center for Supercomputing Applications (NCSA) Faculty Affiliate. Between 1993 and 2003 Tipei was a Visiting Scientist at Argonne National Laboratory where he worked with mathematician Kans G. Kaper on sonification of complex scientific data.

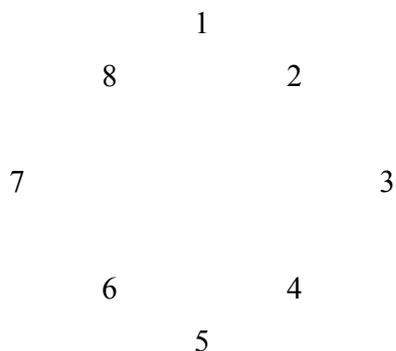
Sever Tipei's main fields of interest are Computer Music and Music Formalization. Most of his

compositions were produced with software he designed: MP1 - for Computer-assisted Composition; DIASS and DISCO - programs for sound synthesis; and M4CAVE - for the visualization of music in an immersive virtual environment. MP1, first used in 1973, was the first such program to run on a supercomputer (CRAY-XMP, in 1986). More recently, Tipei and his collaborators have developed DISSCO, software that unifies Computer-assisted (Algorithmic) Composition and Sound Synthesis into a seamless process.

Sever Tipei's papers have appeared in the Computer Music Journal, Leonardo, and in the proceedings of various International Computer Music Conferences, Music Perception and Cognition, WSEAS, and others. In 1989 he introduced the concept of *manifold composition*, the collection of all actual and potential variants of a computer generated musical work which contains elements of indeterminacy. As a pianist, he has performed in the United States, Korea, France, Italy, Belgium, the Netherlands, and Romania, and recorded for the ORION label.

Tipei regards the computer as a collaborator whose skills and abilities complement those of the human artist. He sees the composition of music both as an experimental and a speculative endeavor that delivers a particular world view.

Technical requirements: either stereo or 8 channel playback system. If 8 channels, the tracks are arranged as follows:



Audio file at: <https://soundcloud.com/sever-tipei/figer-1>