

GROSS Robert

Center for Music Experiment, University of California at San Diego,
La Jolla, CA 92093, USA

activité/activity/attività

The Timbre Tuning System: The system implements an approach very similar to its predecessors, Music IV and Music V. One defines instruments or signal processing networks, functions, and notes or parameter value arrays. Notes drive the instruments by providing begin and end times and input values corresponding to parameters such as frequency, amplitude, modulation index and function name. Functions are first generated and stored, then used by instruments at computation time, usually as lookup tables representing time-domain functions, e.g., waveshape, envelope. The number of instruments, functions and notes in operation simultaneously is arbitrary, though practically limited by the speed and size of the computer at hand. The output of all notes playing at a given sample time is summed and stored on a digital bulk memory device. After computation, sound is realized through converting the stored digital sound samples into analog voltages in real-time.