Zach Benator

Sponsored by Dr. Stuart Gerber

"Horse," a Composition for Solo Snare Drum and Live Electronics

"Horse" is a 6-minute solo I composed to depict feelings of panic and devastation. The piece is for snare drum and live electronics, and every sound in the piece (in addition to the snare drum itself) is an electronically processed version of the performer's own playing. By using a microphone on the drum and running the sound through a laptop, I am able to create additional sounds based on the sound of the drum by adding effects to the sound received by the microphone in real time and amplifying this affected sound through a PA system or other speaker. With a midi foot pedal controller (a board of foot pedals that sends simple messages to a computer or other piece of hardware when each pedal is pressed with the player's foot), the performer can control these live effects while playing.

A goal of mine was to create a snare drum solo that didn't sound like a typical snare drum solo. A single drum on its own is only capable of making so many different sounds, and as a result it can only sound so dynamic. I use live electronics as a means of augmenting the sonic capabilities of the drum with processes such as pitch shifting, filters, delays, looping, and distortion. By looping a note played on the drum very quickly, I create a pitched drone, and by duplicating the signal of this drone and tuning each individual signal to an interval above or below the original, I create a chord, all produced live from the sound of a single note on a snare drum. With distortion I create extremely aggressive and cacophonous sounds that sound nothing like the original sound played on the drum, and using filters and delays I produce a lower or higher voice that echoes the player's phrases with a radically different tone. These techniques all

came about as I experimented with live processing and explored the different sounds of which it was capable, and "Horse" is the result of these experiments.