

Loretta K. Notareschi

Bordoncello

For Violoncello and Live Electronics

DMCM-10

DISEGNI
MUSIC


Bordoncello

For Violoncello and Live Electronics

Performance Instructions

Bordoncello is for improvising cellist and laptopist. The laptopist uses a virtual instrument called the Drone Machine, a Max patch that may be played using Max or Max Runtime (available free from Cycling74). For more instructions on using the Drone Machine, see the next page. The laptopist also uses an amplified telephone pick-up played over the body of the computer. A telephone pick-up is an inexpensive coil microphone, such as Radio Shack's Model 44-533. Both the output of the laptop and the telephone pick-up should be run into the house mixer/speakers.

Each system lasts the approximate length listed below it. Players need not line up their movement from one box to the next precisely but should stay within one box of each other. The laptopist may find it useful to use the clock within the Drone Machine to keep track of time and cue the different systems.

About the Piece

Bordoncello, whose title is an amalgam of the Italian for "drone" and "cello," is for live laptop and cello improvisation. The laptop part is played on a virtual instrument called the Drone Machine, which I built using the interactive electronics software Max.

Bordoncello is the second in a series of pieces for the Drone Machine and live instruments--the first was *Bordone* (from 2012), and the third is *Bordonquartet* (also from 2014). The Drone Machine allows for the layering of filtered drones and the playing of other synthesized and sampled sounds. The laptop player also plays an amplified telephone pickup over the laptop. Into this evocative soundscape, the cello enters with its own otherworldly timbres, including *sul ponticello* (a glassy sound), harmonics, slap and ordinary *pizzicato* (plucked), *glissando* (sliding), and noise made through overpressure with the bow

About the Composer

Loretta K. Notareschi explores the passionate, irreverent, and transcendent in her many compositions for chamber ensemble, large ensemble, and chorus. Born in Canton, Ohio and raised in Stillwater, Oklahoma, she has received awards from the IronWorks Percussion Duo, the American Composers Forum, Ensemble Eleven, and the GALA Choruses. Her music has been performed across the U.S., in Europe, and in South America and is published by Disegni Music (ASCAP), Friedrich Hofmeister of Leipzig, and Bachovich.

Notareschi is an associate professor of music at Regis University and a faculty member of The Walden School. She is also a member of ASCAP and the American Composers Forum. She holds a Masters and PhD in composition from the University of California at Berkeley, a Bachelor of Music in composition from the University of Southern California, and the General Diploma from the Zoltàn Kodály Pedagogical Institute of Music in Kecskemèt, Hungary, where she was a Fulbright Scholar. Her primary teachers in composition have been Morten Lauridsen, Erica Muhl, Rick Lesemann, Cindy Cox, and Jorge Liderman.

How to Use the Drone Machine

To run the Drone Machine, you need Max or Max Runtime (free). These may be downloaded from Cycling74: <http://cycling74.com>. You also need sound files supplied by the composer. Save the patch and all the sound files to the same search path (same folder on your computer).

1. When you open the patch, it should open in presentation mode with a graphical surface that looks like a synthesizer. If not, switch to presentation mode by pressing the easel icon at the bottom of the screen.
2. On the upper right of the patch in presentation mode is the On/Off button for the sound. Turn this on; it should turn red.
3. Turn up the master volume by dragging the fader with the mouse. (And make sure the volume on your computer is turned up.)
4. If you would like to keep track of how much time is going by, click the box next to the word "clock."
5. Click the on/off boxes by the drones across the top to start playing the sound files. Turn up the volume faders to hear the drones.
6. To turn on the white noise, turn up its volume fader.
7. To hear the electronic noise samples, click the on/off box. Turn up the volume fader to hear it.
8. To play the synth sounds, turn up the volume on the triangle and sawtooth waves. Then click on the keyboard to play different notes.
9. To filter the drones and white noise, click and drag on the filter graphs.
10. To add a stutter (granular synthesis) effect, click and drag up and down in the number boxes for "Grain size" and "Playback speed."
11. To alter the playback speed on the drones, click and drag up or down on the number box for playback speed.
12. After turning off the patch, hit the master clear button at the top to return to zero/neutral on all the sliders, filters, etc.

To make playing the Drone Machine easier, plug in a MIDI controller with individual knobs or faders. The Akai MPK Mini works well. The "ctlin" objects 1 through 3 are set to the volume sliders of the first three drones across the top of the Drone Machine; 4 is set to the volume slider of the White Noise; 5-8 are for the filter graphs below these drones.

Bordoncello (2014)

For Violoncello and Live Electronics (Max Patch: Drone Machine and Telephone Pick-up)

Loretta K. Notareschi

	<i>Quietly</i>	<i>Crescendo and decrescendo independently</i>	
Violoncello	Wait	Play low, long, sustained tones consonant with laptop tones	Still sustained but with some shorter tones consonant with laptop tones
Drone Machine/ Telephone Pick-up	Fade in: one drone	Begin to filter for upper partials; layer another drone	Add another drone; continue filtering

~2.5'

	<i>Poco a poco crescendo together</i>		<i>Louder</i>
VC	Sustained tones begin to go against laptop tones and timbres	Same, becoming more intense	Add noise to timbre while making some notes shorter and more dissonant
DM/TP	Add white noise; filter for both lower and upper partials	Add telephone pick-up sounds, subtly at first	Begin to make shorter sounds over longer drones using synth

~2'

	<i>Quite loud</i>		
VC	Make mostly short, fast notes in higher and higher registers; include noisy over-bowing and sul ponticello notes	Skip quickly between lower and higher notes at a fast tempo	Add high harmonics; increase noise content; begin to glissando between some notes
DM/TP	Increase intensity of telephone pick-up sounds	Add stutter~ effect to continuing drones; continue playing short notes using synth	Continue everything, becoming generally noisier

~2'

	<i>Maintain loud volume</i>	<i>Randomly crescendo and decrescendo independently</i>	
VC	Continue and add some slap and ord. pizz. notes.	Make lower notes gradually longer; decrease some activity in higher register	Make longer glissandos between notes; make some glissandos half distorted with bow pressure
DM/TP	Begin to detune low drones, taking their pitch lower	Gradually decrease short synth notes	Increase white noise content, increase stutter~ effect

~1.5'

	<i>End at moderate volume</i>		
VC	Add space between notes and make notes played last longer; continue glissando effect with bow pressure	Increase noise content; stop pizz. notes; play mostly long notes now	End with long, low glissandos and distortion from bow pressure
DM/TP	Decrease number of drones; slow down filter changes; maintain white noise prominence	Allow white noise to drown out other sounds except telephone pick-up	End with white noise and telephone pick-up

~2'

