

**ACMC 2014: AV Concert – Thursday July 10 at 11:45AM  
VCA Federation Hall**

**Charles Nichols, Amber Bushnell - Sound Of Rivers: Stone Drum**

Charles Nichols, music  
Amber Bushnell, video  
Nicole Bradley Browning, choreography  
Mark Gibbons, poetry and narration  
Allison Herther, dance

Sound of Rivers: Stone Drum is a fixed media version of a live performance, a multimedia collaboration between choreographer Nicole Bradley Browning, animator and video artist Amber Marjorie Bushnell, poet and narrator Mark Gibbons, dancer Allison Herther, and composer and electric violinist Charles Nichols, that illuminates research by scientist Mark Lorang, into how insects navigate the ecosystem of floodplains, by the sound of rivers.

After reading Mark Lorang's scientific research and discussing his hypothesis about the migration of the stone fly in relation to the sound of water, poet Mark Gibbons returned to the source, to experience the sounds of water in creeks and rivers. Inspired by both the sounds and images he rediscovered on the Clark Fork River and Petty Creek, he began writing. He knew man had to come into the poem, so the fisherman in him came to the poem. While sound obviously dominates, it was the death of Dave Brubeck that brought actual musicians into the poem and helped it all come together. There is no explaining writing a poem, but he was inspired by the actual experience of going to water, listening to it, watching it, reading the scientific research, and allowing his own memories and tastes in music to enter the poem.

The choreography is divided into three sections representing River: under the river, Animal: in the river, and Human: with the river, with Animal comprised of Insect, Fish, and Bird. The dancer interacts with a large cyclorama, a sheet of elastic and reflective fabric, stretched across the width and depth of the stage. At the back of the cyc is a skirt sewn into the fabric, that allows the dancer to insert themselves into the sheet. The dancer is at times under the fabric, pushing and grasping at the cloth, and at other times attached to the sheet, twisting, stretching, billowing, and plucking the expanse.

The projection and animation is divided into three parts. The first, a panel at the back of the stage, that contains striations that undulate in response to a live audio feed from the music, and a colored shadow based on a live video feed of the dancer. Around the panel, also projected on the back of the stage, is intricate animation composed of hand-drawn water diatoms, river plants and trees, insects, and animals, that grow and move in symmetrical patterns, throughout the piece. These river elements were chosen specifically to reflect the health of the river ecosystem, and are interconnected as they are in the environment. Projected on the cyc, that the dancer interacts with, are animations built from insect and bird wings, and fish scales, that grow in density and modulate in color, as they pass over the surface.

The music is divided into three textures. The piece starts with processed spoken text, recordings of the poet reciting his poem, that have been stripped of their harmonic spectrum, stretched in time, and granulated into jittery textures. These soundfiles, based on words, echo the live narrated text, and cascade in parallel along the sides of the audience, through a quadraphonic sound system, encircling the auditorium. The second texture is comprised of filter banks, built from spectral analysis of recordings taken at the field station and on river floats, that filter recordings taken above and below the water, into surging harmonies, that ebb and flow. These harmonies accompany bowed-string physical model synthesized sound, that uses the data of river depth to drive pitch, river velocity for amplitude or loudness, wind

speed from the North for bow pressure, and from the East for bow position, creating a sonification of the environmental data. Finally, a violinist performs passages, that combine the scales and rhythmic motives, of the music and instrumentalists mentioned in the poetry, into original melodies, processed with multiple layers of phaser and delay effects, that sweep and echo in the four-channel sound system.

Sound of Rivers: Stone Drum is based on work supported by the Montana Institute on Ecosystems award from NSF EPSCoR Track-1 (INSTEP 3) program under Grant # EPS-1101342 at the University of Montana.

Amber Bushnell finished her MFA in Media Arts (Integrated Digital Media option) at the University of Montana in May 2011. Currently, along with being an artist, she works as an online adjunct instructor for the University of Montana's Media Arts Department, a freelance designer, and works full-time as the Graphic Artist/Designer for the University of Montana's College of Visual and Performing Arts. She has also worked as the Lead Designer / Creative Director for 2 of YouTube's New Original Channels: SciShow & CrashCourse Biology. Amber Bushnell's focuses and interests are in illustration, color theory, installations, experience design, live visual performance (VJing), 3D projection mapping, animation, public art, interactive design, and collaboration. Her work combines digital and analog art methods, and she pays close attention to color. Bushnell weaves scientific, historic and cultural details within each of her designs in an abstract style. Throughout her ongoing projects she strives to positively influence the audience by initiating discovery and curiosity. Visit Bushnell's online portfolio at [www.amberstudio.net](http://www.amberstudio.net)

Composer, violinist, and computer music researcher, Charles Nichols ([www.charlesnichols.com](http://www.charlesnichols.com)) is an Assistant Professor of Composition and Music Technology at Virginia Tech, and has earned degrees from the Eastman School of Music, Yale University, and Stanford University. He has presented his compositions, including acoustic and electroacoustic music, and research, including telematic musical performance over Internet2, haptic musical human-computer interface design, and wavelet audio analysis and resynthesis, at national and international conferences and festivals. He has received support from the National Science Foundation, National Endowment for the Arts, and Prop Foundation, and recognition from the National Academy of Music, La Fundación Destellos, Institut de Bourges, New Music USA, ASCAP, and the Montana Arts Council. Recently he was a visiting scholar, at the Sonic Arts Research Centre at Queen's University Belfast, N. Ireland, a visiting composer, with the Namaste Ensemble in Città di Castello and Rome, Italy, and a resident, at the Ucross and Brush Creek Foundations, in Wyoming.

## Luca De Siena - Concrezione

*Concrezione* is an audiovisual work by Luca De Siena (music) and Antonello Belgrano (video). It is an attempt of human exploration of the depths generable within a cathodic domain. This work deals with the raw edges of human perception, manipulating phenomena of retinal persistence and psychoacoustic thresholds. We are surrounded by a universe of architectures, materials concretions of thoughts that should be the extensions of our senses. *Concrezione* uses abstraction as a sum of not-immediately-identifiable shapes even though still human in the way of being assembled and perceived. These audio-visual landscapes are microscopically explored, unravelled, untangled and subsequently re-established.

Luca De Siena graduated *cum laude* in Electronic Music at the Conservatory "L. Refice" of Frosinone under the guidance of prof. Alessandro Cipriani. The questions underlying his research are about the relationship between tradition and innovation and between art's functionality and rituality in modern society. He attended workshops and master classes with Alvisé Vidolin, Leigh Landy, Mary Castro. He studied intermedial art with Alba D'Urbano at the HGB Leipzig (Germany). His acousmatic pieces have been selected in several festivals and concerts in Italy and abroad. His audiovisual work "Concrezione" (video by Antonello Belgrano) has been selected by many international festivals including the International

Computer Music Festival 2012 of Ljubljana (Slovenia) and the WOCMAT of Taiwan. Together with HEKA he is also the author of electroacoustic soundtrack for the silent film "Il Piccolo Garibaldino" commissioned by Nuova Consonanza as a part of the celebrations for the 150th anniversary of the unification of Italy.

As a mastering engineer he has worked on the s post-production of some electronic music records released by some foreign independent labels.

### **Timothy Opie - Roar**

Roar uses the musical composition technique eco-structuralism to manipulate and blend the sonic structures within the roar of waves and the roar of a fire. Eco-structuralism is musical composition technique whereby field recordings are analysed to determine underlying structures, which are then used as musical constructs to create abstract musical works, thereby blending abstract music with natural sound.

### **Josh Simmons - bitPushIntersection**

"The art of meditation is a way of getting into touch with reality, and the reason for it is that most civilized people are out of touch with reality because they confuse the world as it with the world as they think about it and talk about it and describe it. For on the one hand there is the real world and on the other there is a whole system of symbols about that world which we have in our minds. These are very very useful symbols, all civilization depends on them, but like all good things they have their disadvantages, and the principle disadvantage of symbols is that we confuse them with reality, just as we confuse money with actual wealth." - Alan Watts

### **David Hirst - The Shape Of Water**

Duration 7:30

The Shape of Water is a video music work created in the studio by the composer/video artist for a fixed medium. The Shape of Water actually re-shapes water sounds in a percussive duel with sampled, metallic percussive timbres, and creates semi-abstract imagery from video of water images. The sounds and images were recorded in, and around, Melbourne's arts precinct. The Shape of Water is the title track from an album just released on iTunes, available at:

<https://itunes.apple.com/au/album/the-shape-of-water/id868097395>

The Shape of Water video can be downloaded from Vimeo at:

<https://vimeo.com/92104698>