

# MUS\_TECH 442 History and Analysis of Electroacoustic Music

## Syllabus

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Office hours: TuTh 2:30-3:30 Please communicate by email!

**Who Should Take This Class?** This class is designed for advanced students in:

- Electroacoustic music composition,
- history of 20<sup>th</sup> century music,
- analysis of 20<sup>th</sup> century music, or
- music perception/cognition.

**Scope of the Class.** One focus of this class is the history electroacoustic music, including the development of the technical bases of the field, but largely viewed from the perspective of its cultural evolution. Another focus is the analysis of electroacoustic music. This includes the various discussions provided by composers as well as considerations of the perception and cognition of electroacoustic music. This class is organized under the proposition that neither history nor analysis is complete without the perspective brought by the other.

**Textbook:** Course-packet “Readings in the History and Analysis of Electroacoustic Music” (available at Quartet)

**Software:** It is recommended that each person have access to an application that can produce spectrographs. One such application is Amadeus II that can be purchased at <http://www.hairersoft.com/Amadeus.html> for \$30.

### **Assignment: Essays in Electroacoustic History and Analysis**

Three times during the quarter and once for the final project, you will be asked to write essays relevant to the material being covered in class. The focus of each essay will be assigned. It is expected that the content of the readings and the material discussed in class will be reflected as appropriate in the essays. Authors may be asked to present their ideas to the class and to engage in a dialog with class members.

**Grade.** The course grade will be based 2/3 on the first three essays and 1/3 on the final.

## Class Schedule

### **Weeks 1-2: Introduction**

Camilleri, Lelio. (1993) “Electro-Acoustic Music: Analysis and Listening Processes.” URL:  
<http://www.memex.it/sonus/camill.htm>,

McEvelley, Thomas. (1993) “Thirteen Ways of Looking at a Blackbird.” *Art & Discontent: Theory at the Millennium*. Kingston, N.Y.: McPherson & Company. pp 70-87.

### **Weeks 2-3: Europe and the Early Years**

**Pierre Schaeffer and Pierre Henry: Symphonie pour un Homme seul (1950-53)**

Manning, Peter. (1985). "Paris and *Musique concrète*." 19-42. *Electronic and Computer Music*. Oxford: Clarendon Press.

**Edgard Varese: Poeme Electronique (1957-58)**

Treib, Marc with musical analysis by Richard Felciano. (1996) "Organized Sound." 168-213. *Space calculated in seconds: The Philips Pavilion, Le Corbusier, Edgard Varèse*. Princeton, N.J.: Princeton University Press.

**Karlheinz Stockhausen: Gesang der Jünglinge (1955-6)**

Manning, Peter. (1985). "Cologne and *Elektronische Musik*." 43-78. *Electronic and Computer Music*. Oxford: Clarendon Press.

Stockhausen, Karlheinz. (1971) "Four Criteria of Electronic Music." 88-111. *Stockhausen on Music*. Compiled by Robin Maconie. Originally published 1989 London: Marion Boyars.

Decroupet, Pascal and Elena Ungeheuer. (2002) "Through the Sensory Looking-Glass: The Aesthetic and Serial Foundations of *Gesang der Jünglinge*." *Electroacoustic Music: Analytical Perspectives*. Edited by Thomas Licata. Westport, Connecticut: Greenwood Press.

**1st Essay Assignment: Due Oct. 11**

**Weeks 3: Synthesizers, Live Music and the Experimental Tradition**

**Walter/Wendy Carlos: Switched-On Bach**

**Morton Sobotnick: Silver Apples of the Moon, Part A (1967)**

**Mario Davidovsky: Synchronism No. 6**

**Gordon Mumma:**

**Alvin Lucier: I am sitting in a room (1970)**

Chadabe, Joel. (1975) "The Voltage-controlled Synthesizer." In *The Development and Practice of Electronic Music* by Jon H. Appleton and Ronald C. Perera. Englewood Cliffs, New Jersey: Prentice-Hall. Pp. 138-188

Manning, Peter. (1985). "Live Electronic Music." 187-200. *Electronic and Computer Music*. Oxford: Clarendon Press.

Roads, Curtis. (1988). "Interview with Morton Subotnick." 9-18. *Computer Music Journal*. 12(1).

**Week 4: US: West Coast/East Coast**

**Chowning: Turanus (1972)**

Chowning, John M. (1971) "The Simulation of Moving Sound Sources." *Journal of the Audio Engineering Society*, 19(1). Reprinted in the *Computer Music Journal*, 1(3).

Chowning, John M. (1973) "The Synthesis of Complex Audio Spectra by Means of Frequency Modulation." *Journal of the Audio Engineering Society*, 21(7). Reprinted in the *Computer Music Journal*, 1(2).

**Michael McNabb: Dreamsong (1978)**

McNabb, Michael. (1982). "Dreamsong: The Composition." 36-53. *Computer Music Journal*, 5(4).

**Charles Dodge: Any Resemblance Is Purely Coincidental (1980)**

**Paul Lansky: Night Traffic (1990), Idle Chatter (1985)**

Roads, C. (1983) "Interview with Paul Lansky." 16-24. *Computer Music Journal*, 7(3).

**Weeks 4-5: Canada: West Coast/Montreal**

Schafer, R. Murray. (1977). "Music, the Soundscape and Changing Perceptions." 103-119. *Tuning of the World*. New York: Knopf.

**Barry Truax: Riverrun (1986)**

Truax, Barry. (1988) "Real-time Granular Synthesis with a Digital Signal Processor." 14-26. *Computer Music Journal*, 12(2). Cambridge, MA: MIT Press.

Truax, Barry. (1996) "Soundscape, Acoustic Communication & Environmental Sound Composition," 49-65, *Contemporary Music Review*, 15(1). Amsterdam: Harwood.

**Dhomont, Frances Novars (1989)**

Dhomont, Frances. (1996) "Is There a Québec sound?" 23-28. *Organised Sound*, 1(1).

## **2nd Essay Assignment, Due Oct. 25**

### **Weeks 6-8: France/IRCAM**

#### **Jean Claude Risset: *Sud* (1987)**

Risset, Jean-Claude. (1996). "Real-World Sounds and Simulacra in my Computer Music." 29-47.

*Contemporary Music Review*. 15(1). Amsterdam: Harwood.

Ferreir, Giselle Martins Dos Santos. (19XX) "A perceptual approach to the analysis of J.C. Risset's *Sud*: sound, structure and symbol." *Organised Sound*, 2(2). Cambridge University Press.

#### **Jonathan Harvey: *Mortuos Plango, Vivos Voco* (1980)**

Harvey, Jonathan. (1982) "Mortuos Plango, Vivos Voco: A Realization at IRCAM." *Computer Music Journal*, 5(4). pp. 22-24.

#### **Kaija Saariaho: *Jardin Secret I* (1984-5)**

Saariaho, K. (1987). "Timbre and Harmony: Interpolations of Timbral Structures." 93-133.

*Contemporary Music Review*. 2(1), Amsterdam: Harwood.

## **3rd Essay Assignment: Due Nov.15**

### **Week 9-11: England**

#### **Dennis Smalley: *Empty Vessels* (1997)**

Smalley, Denis. (1986). "Spectro-Morphology and Structuring Processes." 61-93. *The Language of Electroacoustic Music*. Edited by Simon Emmerson. New York: Harwood Academic.

Smalley, Denis. (1992). "The Listening Imagination: Listening in the Electroacoustic Era." 514-554. In *Companion to Contemporary Musical Thought*. Eds. Paynter, J., Howell, T., Orton, R., and Seymour, P. London: Routledge.

#### **Trevor Wishart: *Vox-5* (1986)**

Wishart, Trevor. (1986) "Sound Symbols and Landscapes." 41-60. In *The Language of Electroacoustic Music*. Edited by Simon Emmerson. New York: Harwood Academic.

## **Final Essay: Due Dec. 7**