Extended Syllabus
(2014 1st Semester)

Course Title	Digital Media Art Workshop	**Course Number**	ANT3008
Credit	3	**Enrollment Eligibility**	2, 3, 4
Class Time	**Mon 15:00~16:15, Wed 16:30~17:45**	**Classroom**	AS111

Instructor's Photo	**Name: Hyunkyung (Haru) Ji**	**Homepage: http://jiharu.github.io/ant3008/**
	E-mail: Ji, H <haruoneday@gmail.com>	**Telephone:**
	Office: X 407 **Office Hours: Fri (14:00~18:00) will be set up by mail.**	

I. Course Overview

1. Description

The goal of this class is for students to understand theoretical aspects and important concepts in the digital media art field and to learn how to create visual and audio expressions through programming, using one of the most widely used media arts tools today: Processing. Processing is designed for artists to create computational art using algorithmic techniques. The class starts at beginner level and will end at an intermediate level and students will work in collaboration while joining multiple teams (at least two each).

Along with small assignments and team presentations during the class, for evaluation, students will submit their research and multimedia project expressing their open-ended creative exploration.

2. Prerequisites

Nothing but willing motivation and an open-minded perspective.

3. Course Format (%)

Lecture	Discussion	Experiment/Practicum	Field study	Presentations	Other
30 %	20 %	30 %	%	20 %	%

4. Evaluation (%)

mid-term Project	Final exam	Quiz	Presentations	Final Projects	Assignments	Participation	Other
20 %	%	10 %	%	30 %	30 %	10 %	%

II. Course Objectives

Students will learn:
1) What are important issues and historical events in the Digital Media Art field.
2) What is computational art, and what are its structure and components.
3) What to express: gain good understanding and inspiration of digital media.
3) How to use Processing and how to create visual and audio systems and art (expression).

Creating and expressing artistic intentions with sensory data with computers (computational arts) asks students for a very strong interdisciplinarity (especially between liberal arts, science and engineering) and an open-minded attitude.

III. Course Format

(* In detail)

The class will consist of theory and practice. Parts of the classes will be lecture-based, drawing upon the structure of our subject using presentations (30%), while other parts will take a workshop format using computer software (30%). Students will also contribute to the class by presenting team research and practice (20%). The remainder will be discussion (20%).

Students will share their homework through the Openprocessing website - (**http://www.openprocessing.org/classroom/3620**).

Questions and discussion are encouraged during the class time.

IV. Course Requirements and Grading Criteria

1) Small assignments to evaluate how students follow the class topics (30%).
(When you submit, please name your assignment as the following format: yourschoolid_name_date.extension)
2) Mid-term: team presentation on the research topic (20%) and quiz (10%).
3) Final-term: project (30%).

Participation and collaboration will also be counted (10%).

V. Course Policies

Using the software:

1) Processing is an open, cross-platform software. Please download and install from: http://processing.org/

Online materials: class notes (**http://jiharu.github.io/ant3008/**) & students portfolio (**http://www.openprocessing.org/classroom/3620**)

- Regular updates of your work on time is important, and will be reflected to the grade.

2) Support for the disabled: seat support/ Extensions on homework's and project submissions/ TA support etc.

VI. Materials and References

Reading: The Language of New Media Chap 1, Lev Manovich, The MIT press, 2001
Understanding Media Chap 1, Marchall McLuhan, The MIT press
The New Media Reader, Edited by Wardrip-Fruin and Nick Montfort, The MIT press, 2003
Multimedia: From Wagner to Virtual Reality, W.W. Norton & Company, 2001

미디어아트-예술의 최전선, 휴머니스트, 2009
영상기계와 예술, 현대미학사, 1996

Processing: http://processing.org/
Getting Started with Processing
Casey Reas and Ben Fry.
Published June 2010, O'Reilly Media. 208 pages. Paperback.

Learning Processing: A Beginner's Guide to Programming Images, Animation, and Interaction
Daniel Shiffman.
Published August 2008, Morgan Kaufmann. 450 pages. Paperback.

Help, tutorial, reference file in the Processing software / website

VII. Course Schedule

(* Subject to change)

Week 1	**Learning Objectives**	Introduce class & format, multimedia theory, start Processing.
	Topics	Introducing class format and get ready for the class.
	Class Work (Methods)	Survey Lecture/Discussion with presentation materials & practice
	Materials (Required Readings)	The Language of New Media Getting Started with Processing / Learning Processing
	Assignments	Assignments will be announced on the class website
Week 2	**Learning Objectives**	Multimedia theory, Processing GUI and starting the first drawing
	Topics	What is new media? Processing: Hello, world / starting the code & drawing
	Class Work (Methods)	Lecture/Discussion with presentation materials & practice
	Materials (Required Readings)	Understanding Media Getting Started with Processing / Learning Processing
	Assignments	Assignments will be announced on the class website
Week 3	**Learning Objectives**	Learning basic grammar of Processing

	Topics	Is media the message? Processing: Variables/Response
	Class Work (Methods)	Lecture/Discussion with presentation materials & practice
	Materials (Required Readings)	Multimedia: From Wagner to Virtual Reality Getting Started with Processing / Learning Processing
	Assignments	Assignments will be announced on the class website
Week 4	**Learning Objectives**	Learning basic grammar to use Processing
	Topics	Multimedia theory Processing: Media/Motion
	Class Work (Methods)	Team presentation I Lecture/Discussion with presentation materials & practice
	Materials (Required Readings)	Multimedia: From Wagner to Virtual Reality Getting Started with Processing / Learning Processing
	Assignments	Assignments will be announced on the class website
Week 5	**Learning Objectives**	Understanding how to use functions & objects in Processing
	Topics	Multimedia theory Processing: Functions & Objects
	Class Work (Methods)	Team presentation II Lecture/Discussion with presentation materials & practice
	Materials (Required Readings)	Multimedia: From Wagner to Virtual Reality Getting Started with Processing / Learning Processing
	Assignments	Assignments will be announced on the class website
Week 6	**Learning Objectives**	Understanding how to use arrays in Processing
	Topics	Multimedia theory Processing: Arrays
	Class Work (Methods)	Team presentation III Lecture/Discussion with presentation materials & practice
	Materials (Required Readings)	The New Media Reader Getting Started with Processing / Learning Processing

	Assignments	Assignments will be announced on the class website
Week 7	**Learning Objectives**	Get inspired!
	Topics	Multimedia practice Processing: Project design (finding good examples)
	Class Work (Methods)	Team presentation IV Lecture/Discussion with presentation materials & practice
	Materials (Required Readings)	The New Media Reader http://processing.org/exhibition/ http://processing.org/learning/topics/ etc.
	Assignments	Assignments will be announced on the class website
Week 8	**Learning Objectives**	Mid-term
	Topics	Submit and present the team research project
	Class Work (Methods)	Feedback and evaluation
	Materials (Required Readings)	
	Assignments	
Week 9	**Learning Objectives**	Understanding how to use classes in Processing
	Topics	Media Art theory Processing: Classes
	Class Work (Methods)	Lecture/Discussion with presentation materials & practice
	Materials (Required Readings)	The New Media Reader Getting Started with Processing / Learning Processing
	Assignments	Assignments will be announced on the class website
Week 10	**Learning Objectives**	Understanding how to use classes in Processing
	Topics	Media Art theory Processing: Classes

	Class Work (Methods)	Lecture/Discussion with presentation materials & practice
	Materials (Required Readings)	The New Media Reader Getting Started with Processing / Learning Processing
	Assignments	Assignments will be announced on the class website
Week 11	**Learning Objectives**	Extending Processing: Physics I
	Topics	Media Art theory Processing: Extending
	Class Work (Methods)	Team presentation II Lecture/Discussion with presentation materials & practice
	Materials (Required Readings)	The New Media Reader The Nature of Code
	Assignments	Assignments will be announced on the class website
Week 12	**Learning Objectives**	Extending Processing: Physics II
	Topics	Media Art theory Processing: Extending
	Class Work (Methods)	Team presentation III Lecture/Discussion with presentation materials & practice
	Materials (Required Readings)	The New Media Reader The Nature of Code
	Assignments	Assignments will be announced on the class website
Week 13	**Learning Objectives**	Media Art theory Extending Processing: Physics III
	Topics	Processing: Extending
	Class Work (Methods)	Team presentation IV Lecture/Discussion with presentation materials & practice
	Materials (Required Readings)	The Nature of Code
	Assignments	Assignments will be announced on the class website

Week 14	**Learning Objectives**	Extending Processing: extensions (OSC, OpenGL, etc), Processing.js, Java, physical computing
	Topics	Media Art theory Processing: Extending
	Class Work (Methods)	Team presentation I Lecture/Discussion with presentation materials & practice
	Materials (Required Readings)	The New Media Reader Getting Started with Processing / Learning Processing
	Assignments	Assignments will be announced on the class website
Week 15	**Learning Objectives**	Final project work
	Topics	Sharing good examples & information, progress and problem solving
	Class Work (Methods)	Group discussion and class feedback
	Materials (Required Readings)	
	Assignments	Assignments will be announced on the class website
Week 16	**Learning Objectives**	Final-term
	Topics	Final project presentations
	Class Work (Methods)	Feedback and evaluation
	Materials (Required Readings)	
	Assignments	

VIII. Special Accommodations
