Creative Digital Design

Time: Wednesday 1:10-4:00 pm  
Location: Institute of Creative Industry Design  
Instructor: Taysheng Jeng 鄭泰昇  
tsjeng@mail.ncku.edu.tw  
Prof. Chien-Hsu Chen 陳建旭  
chenhsu@mail.ncku.edu.tw

Course Objective: The objective of this course is for students to learn basic knowledge about interaction design and state-of-the-art digital technology useful in creative design industry. This course introduces the fundamental concept of human-computer interaction, including ubiquitous computing, interactive products, and user interface design. Sustainability is another topic to be discussed in the class. The course will focus on creativity, innovation, and entrepreneurship, and other issues relevant to creative digital design.

Course Outline: The course will be divided into three sections:
Section I: Interaction Design - ubiquitous computing, human-computer interaction, user interface design, service design, experience design
Section II: Sustainability - green technology,  
Section III: Human-Centered Design - concept design, brainstorming, evaluation, usability tests

Lecture/Presentation: The course is divided into Lecture for one hour and Presentation for two hours. Students are responsible for all material covered in class and the required readings, including in-class presentation.

Required Skills: Basic English for in-class discussion and presentation, Basic presentation skills, and basic image and video editing skills

Grading Policy: Class grades will be based on in-class presentation, mid-term workshop projects, and mid-term and final reports.

Grade:  
In-class presentation: 20%  
Workshop (I) (II) (III): 30%  
Mid-term Report: 20%  
Final Report: 20%
# Course Outline

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<td>UbiComp(3): Interface and Experience Design</td>
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<td>Ubiquitous Computing</td>
<td>Readings by Michael Fox</td>
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<td>Kinetic Design, Responsive Architecture,</td>
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<td>UbiComp(4): Interactive Architecture</td>
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<td>International Workshop (I): Prof. Michael Fox</td>
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<td>Interactive Products</td>
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<td>Activity-focused Research</td>
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<td>Smart = Green + Network</td>
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<td>Green Technology and Ecological Systems</td>
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<td>International Workshop (II): Prof. Mark Gross and Prof. Ellen Do</td>
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<td>&lt; Social Web &gt;</td>
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<td>Observation and Problem Identify</td>
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<td>Final Presentation</td>
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## Readings :

**<Interaction Design>**


http://www.designinginteractions.com/

<Sustainability>

<Social Web>

<MIT Media Lab>
1. MIT Media Lab [http://www.media.mit.edu](http://www.media.mit.edu)
2. MIT SENSEable City Lab [http://senseable.mit.edu](http://senseable.mit.edu)

<Google>

<IDEO>
13. IDEO [www.ideo.com](http://www.ideo.com)

【Apple】

【Programming】

WWW:
1. 成大互動建築研究室  [http://ialab.tw](http://ialab.tw)
3. MIT Media Lab
   (1) 【Tangible Media Group】 [http://tangible.media.mit.edu/projects/Tangible_Bits/projects.htm](http://tangible.media.mit.edu/projects/Tangible_Bits/projects.htm)
   (2) 【Smart Cities Group】 [http://cities.media.mit.edu/](http://cities.media.mit.edu/)
   (3) 【Sensible City】 [http://senseable.mit.edu/](http://senseable.mit.edu/)
   (4) 【Ambient Intelligence Group】 [http://interact.media.mit.edu/](http://interact.media.mit.edu/)
6. 【EQUATOR】 [http://machen.mrl.nott.ac.uk/home.html](http://machen.mrl.nott.ac.uk/home.html)
7. 【The Disappearing Computer】 [http://www.disappearing-computer.net/index.html](http://www.disappearing-computer.net/index.html)
16. Flash on-site teaching materials  [http://w3.id.tue.nl/nl/intranet/e_atelier/phidgets/flash](http://w3.id.tue.nl/nl/intranet/e_atelier/phidgets/flash)