Technologies of Visualization and Fabrication – Distributional Electives

Description
Architectural design processes and techniques have been dramatically reorganized in response to advances in digital technologies over the past few decades, which have changed everything in the design practice, from data visualization, to project presentation, to building component fabrication and project delivery. The GSD has remained at the forefront of the critical thinking and use of these technologies through their study in core courses, studios, and electives. The distributional elective requirement asks students to investigate these technologies in greater depth by taking one or more selected electives in the 2000 or 6000 curriculum areas. These courses expose students to an ever expanding repertoire of computational media and techniques in the areas of both design visualization and conceptualization, and object fabrication.

Archive of Past Approved Courses
Note: For a course to count towards a requirement, it must be taken in the year that it was listed as valid.

Fall 2021
2228 Digital Media: Models  Hyojin Kwon, Zachary Seibold
2229 Digital Media: Not Magic  Michelle Chang
6317 Materials Systems: Digital Design and Fabrication  Nathan King, Zachary Seibold
6338 Introduction to Computational Design  Jose Garcia del Castillo Lopez
6359 Interface Design: Integrating Material Perceptions  Sawako Kaijima
6476 Transformable Design Methods  Chuck Hoberman

Spring 2021
2225 Digital Media: Design Systems  Sawako Kaijima
2227 Digital Media: Writing Form  George Legendre
2229 Digital Media: Not Magic  Michelle Chang
6365 Enactive Design: Creative Applications through Concurrent Human-Machine Interaction  Jose Garcia del Castillo Lopez
6368 Pre- and Post-  Hyojin Kwon
6478 Informal Robotics/New Paradigms for Design & Construction  Chuck Hoberman

Fall 2020
2223 Digital Media: Telepresence, Empathy, and Spatial Immersion  Allen Sayegh
2228 Digital Media: Artifacts  Hyojin Kwon, Zachary Seibold
2314 Responsive Environments: Episodes in Experiential Futures  Allen Sayegh
2481 Public Projection: Projection as a Tool for Expression and Communication in Public Space  Krzysztof Wodiczko
6317 Materials Systems: Digital Design and Fabrication  Nathan King, Zachary Seibold
6338 Introduction to Computational Design  Jose Garcia del Castillo Lopez
6359 Interface Design: Integrating Material Perceptions  Sawako Kaijima
6476 Transformable Design Methods  Chuck Hoberman

Spring 2020
2223 Digital Media: Ambiance  Allen Sayegh
2227 Digital Media: Writing Form  George Legendre
2314 Responsive Environments: Episodes in Experiential Futures  Allen Sayegh
2349 MAKE/BELIEVE  Dan Borelli
6365 Enactive Design: Creative Applications through Concurrent Human-Machine Interaction

6368 Pre- and Post-

6478 Informal Robotics/New Paradigms for Design & Construction

Fall 2019

2228 Digital Media: Manipulations

2229 Digital Media: Composition

2481 Public Projection: Projection as a Tool for Expression and Communication in Public Space

6317 Materials Systems: Digital Design and Fabrication

6338 Introduction to Computational Design

6476 Transformable Design Methods

Spring 2019

2223 Digital Media: Ambiance

2227 Digital Media: Writing Form

2314 Responsive Environments: Episodes in Experiential Futures

2352 Sections of Every Thing

6359 Interface Design: Integrating Material Perceptions

6432 Computational Design 2: Time/Design as Signal

6459 Mechatronic Optics

6448 Informal Robotics/New Paradigms for Design & Construction

Fall 2018

2225 Digital Media: Design Systems

2226 Digital Media: Image

2349 MAKE/BELIEVE

2350 Graphic / Volume Conflations

2481 Public Projection: Projection as a Tool for Expression and Communication in Public Space

6317 Material Systems: Digital Design and Fabrication

6338 Introduction to Computational Design

6465 Deployable Surfaces: Dynamic Performance Through Multi-Material Architectures

Spring 2018

2224 Digital Media II

2346 Near Drawing

2453 Graphic Narratives

2483 Projection-Animation

6358 Computational Geometry

6425 Material Distributions: Digital Immersive Workflows for...

Fall 2017

2456 Experiments in Computer Graphics

2481 Public Projection: Projection as a Tool for Expression and Communication...

6317 Material Systems: Digital Design and Fabrication

6349 Mapping II: Geosimulation

6338 Introduction to Computational Design

6463 Hybrid Formations

6465 Deployable Surfaces: Dynamic Performance Through Multi-Material...