

Design Process Squiggle by Damien Newman

Nike Air Jordan by Differently Studios

²⁰¹⁹ Design + Make | Summer Workshop

Instructor: Jose Alcala (jose.m.alcala@njit.edu)

Summer 2019 | One Week Workshop | 9:00am-12:30pm and 1:30pm - 5:00pm

Workshop Location: Weston Hall

WORKSHOP DESCRIPTION:

Today's designers combine art, technology, and science to develop products that not only look good but also address 21st-century needs. Participants will experience how it feels to be a designer working on the forefront of these emerging practices and how they relate to challenges of our contemporary environment. The workshop will introduce the concept of *design thinking*, a process the will take you from brainstorming, to developing, to prototyping, to "pitching" your creations. Workshop participants will get an opportunity to learn about new trends in personal fabrication through the use of state-of-the-art additive and subtractive digital tools and equipment. The workshop will also provide participants with an opportunity to learn software that will be instrumental in the use of digital fabrication technologies including laser cutting, 3D printing and CNC cutting.

PROJECTS:

During this one week workshop you will be working on two projects, using various techniques and tools, both digital and analogue. The projects will be an important vehicle for you to learn about design thinking and workflow.

Subculture Artifact:

Digging deep into a subculture of your choosing you will have the opportunity to design footwear that speaks to the needs, wants and desires of that subculture as well as the values and mythologies it communicates. You will be introduced to research methodologies, modes of communication, aesthetics and prototyping techniques.

Planar Construction

3D aesthetics and function will be explored through planar relationships and the interplay of material and light. The student will have access to laser cutting and thermoforming tools to create a unique functional and evocative light fixture.

Fieldtrip:

Cooper Hewitt Smithsonian Design Museum

Exhibition

The workshop will culminate in a gallery exhibition of your creations. All participants will work together to curate and assemble a group exhibition for invited parents and guests. You will have the opportunity to display and demonstrate your work and gather feedback from guests.

Schedule:

Sunday	Welcome Dinner	
Monday	Footwear Project Introduction	Subculture Artifact
	Video "Just For Kicks"	
	Subculture Research	
	2D and 3D Ideation	
Tuesday	Prototyping	
	Documentation of Work	
	2:30 Early Dismissal	
Wednesday	Laser Cut Light Fixture Project Introduction	Planar Construction
	Research and 3D Ideation	
	2D CAD Tutorial	
	Field Trip and Dinner	
Thursday	Laser cut templates	
	Assembly of Laser Cut Light Fixture	
Friday	Documentation of Work	
	Gallery Setup	Exhibition
	General Viewing of Work and Demonstrations	