



Peter Eisenman, House I (left) and House VI (right) Diagrams

## Week 1: Assignment 01 - Digital Diagramming

### Introduction:

Assignment 01 will introduce students to the capabilities of digital diagramming and understanding how to 3D model through iterative design. Different 3D modeling techniques will allow students to produce diagrams that show relationships between architectural elements like envelope, structure, and threshold and more experiential elements like light, shadow, color, and material. Students will approach this assignment through the study of an existing built architectural precedent.

### Weekly Learning Objectives:

1. Research and document an assigned precedent study.
2. Summarize architectural concepts through analyzing architectural graphics and imagery.
3. Apply 3D modeling techniques to interpret architectural concepts.
4. Analyze spatial organization and architectural relationships within a 3D model.
5. Evaluate moments of aesthetic and architectural value within a series of 3D models.
6. Create an iterative diagram showing the evolution of architectural and spatial elements.

### Assignment Checklist:

1. A single 36"X36" Sequential Diagram
  - a. The diagram should be broken into 9 individual massing images like the diagram shown above.
  - b. Please use the Adobe Illustrator template provided.
  - c. All images should be done from the same axonometric point of view.

### Course Resources:

Please use the following link for the recorded tutorial that will help you complete this assignment:

- <https://youtu.be/8dusvCK2s3s> – this will cover the following:
  - o Intro to 3D modeling using Rhino3D to create detailed massing models
  - o Intro to rendering using Rhino3D's built-in rendering program
  - o Extracting linework from your 3D models using Rhino3D
  - o Overlaying renderings and linework in Adobe Illustrator
  - o Creating your final image

### Week Review:

Students should understand the process of 3D modeling through iteration and displaying their work through a series of diagrams. Through these diagrams, students will have explored the architectural and spatial relationships created by their assigned precedent.

### Next Week:

Students will utilize their 3D models to produce their first animation.