Unit 03: Now You're Cooking - Kitchen Design

Content Area: **Technology**
Course(s): **Architecture**
Time Period: **October**
Length: **12 Blocks**
Status: **Published**

Transfer Skills

Efficient kitchen design is planned around the stove, sink, and refrigerator, which all form the “work triangle.”

Enduring Understandings

1. Kitchen design is mainly driven by client needs and specifications.

2. Kitchens are often designed in combination with the dining and living rooms to form one large living/eating area.

3. Efficient kitchen design is planned around the stove, sink, and refrigerator, which all form the “work triangle.”

Essential Questions

1. Why are kitchens often the first room designed when designing a whole house?

2. What safety concerns are there when designing a kitchen?

3. What are some of the client needs to keep in mind when designing kitchens?

4. What factors needs to be taken into consideration when designing the cabinet layout in a kitchen?

5. Why are kitchens sometimes considered the "heart" of a house?

Content

Vocabulary:

work triangle, I-shape, U-shape, L-shape, corridor, peninsula, island, elevation drawing, sink, oven, range, refrigerator, breakfast bar, breakfast nook, lower cabinets, upper cabinets, dish washer

Skills

1. Classify and discuss the various types of kitchen layout.

2. Calculate the work triangle in a kitchen.

3. Create layouts of the counters, appliances and cabinets for kitchens of various shapes and sizes.

4. Create an elevation drawing of a kitchen.

5. Create a floor plan of a custom kitchen that incorporates safety, client needs, efficiency.

6. Create a scale model of a custom kitchen design.

Resources

11x17 Paper / Drawing Boards / T Square / Pencil / Erasers / Rendering Markers

Standards

NJ: Grade 9 - 12

9.3 CTE: B. Architecture & Construction Career Cluster

Academic Foundations:

9.3.12.AC-DES.5 Identify the diversity of needs, values and social patterns in project design, including accessibility standards.

Communication Skills:

9.3.12.AC-DES.6 Apply the techniques and skills of modern drafting, design, engineering and construction to projects.

9.3.12.AC-DES.7 Employ appropriate representational media to communicate concepts and project design.

9.3.12.AC-DES.1 Justify design solutions through the use of research documentation and analysis of data.

Problem-Solving and Critical Thinking:

9.3.12.AC-DES.8 Apply standards, applications and restrictions pertaining to the selection and use of construction materials, components and assemblies in the project design.

9.3.12.AC.4 Evaluate the nature and scope of the Architecture & Construction Career Cluster and the role of architecture and construction in society and the economy.

9.3.12.AC.6 Read, interpret and use technical drawings, documents and specifications to plan a project.

9.3.12.AC.1 Use vocabulary, symbols and formulas common to architecture and construction.

9.3.12.AC.1	Use vocabulary, symbols and formulas common to architecture and construction.
9.3.12.AC.4	Evaluate the nature and scope of the Architecture & Construction Career Cluster and the role of architecture and construction in society and the economy.
9.3.12.AC.6	Read, interpret and use technical drawings, documents and specifications to plan a project.
9.3.12.AC-DES.1	Justify design solutions through the use of research documentation and analysis of data.
9.3.12.AC-DES.5	Identify the diversity of needs, values and social patterns in project design, including accessibility standards.
9.3.12.AC-DES.6	Apply the techniques and skills of modern drafting, design, engineering and construction to projects.
9.3.12.AC-DES.7	Employ appropriate representational media to communicate concepts and project design.
9.3.12.AC-DES.8	Apply standards, applications and restrictions pertaining to the selection and use of construction materials, components and assemblies in the project design.