Unit 3: Ideation & Brainstorming

Content Area: **Business**
Course(s): **Foundations of Creative Design**
Time Period: **Semester 1**
Length: **3-4 weeks**
Status: **Published**

Standards

CS.9-12.8.2.12.ED.1	Use research to design and create a product or system that addresses a problem and make modifications based on input from potential consumers.
CS.9-12.8.2.12.ED.2	Create scaled engineering drawings for a new product or system and make modification to increase optimization based on feedback.
CS.9-12.8.2.12.ED.3	Evaluate several models of the same type of product and make recommendations for a new design based on a cost benefit analysis.
CS.9-12.8.2.12.NT.2	Redesign an existing product to improve form or function.
CS.9-12.8.2.12.ETW.4	Research historical tensions between environmental and economic considerations as driven by human needs and wants in the development of a technological product and present the competing viewpoints. Changes caused by the introduction and use of a new technology can range from gradual to rapid and from subtle to obvious, and can change over time. These changes may vary from society to society as a result of differences in a society's economy, politics, and culture.

Enduring Understandings

- Generating many ideas is a critical step in the creative problem-solving process.
- Innovation often emerges when ideas are built collaboratively and refined through structured methods.
- Divergent and convergent thinking help balance creativity with practicality.

Essential Questions

- How can we generate a wide range of creative ideas?
- What makes an idea worth developing?
- How do structured brainstorming strategies enhance innovation?

Knowledge and Skills

- Differentiate between divergent and convergent thinking and apply both to ideation sessions.

- Use brainstorming strategies like Crazy 8s, SCAMPER, and mind mapping to generate innovative ideas.
- Evaluate the ethical reasoning used to make choices in the solution sets.
- Create idea mash-ups by combining unrelated concepts to develop novel solutions.
- Use storyboarding techniques to visualize a user's journey or product use scenario.
- Pitch refined ideas to peers and provide constructive critique during feedback sessions.
- Reflect on peer input to revise and select final concepts for prototyping.

Transfer Goals

- Students will independently apply brainstorming and ideation techniques to generate multiple solutions in real-world problem-solving situations.
- Students will value collaboration and feedback as part of a repeatable process for refining ideas across academic, career, and life contexts.