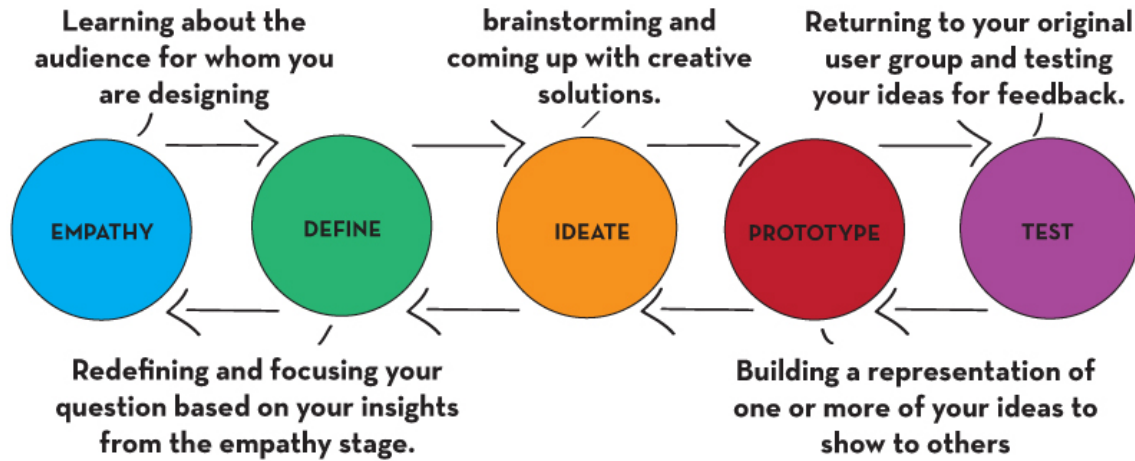


Hemi-Gadget Design Challenge



In this challenge, your team will design a gadget or tool that helps a hemiplegic person in a simple, daily task.

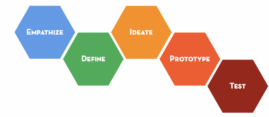
You will be assessed by rubric.

+	Exceeds Expectation
✓	Meets Expectation
△	Approaches Expectation
⊘	Missing

There are several different deliverables that are due at different times.

Even though you are working in teams, each person is responsible for keeping track of and meeting deadlines as well as keeping an individual Design Journal up-to-date.

Hemi-Gadget Design Challenge



Empathize

Interview a hemiplegic person or a person who has assisted a hemiplegic person with daily activities.

Take notes on the interview.

Who is my user?

What matters to this person?

What specific needs does this person have?

What specific concerns?

Observations

Tell the User's story by understanding his/her point of view.

Define

Create a point of view that is based on user needs and insights.

Process and synthesize the findings from your empathy work.

Form a user point of view that you will address with your design.

Ideate

Brainstorm and come up with as many creative solutions as possible.

Wild ideas encouraged!

Generate a huge number of ideas.

Go beyond the obvious.

Prototype

Transform your ideas into a physical form.

Use cheap, plentiful materials such as index cards, rubber bands, popsicle sticks.

Experience and interact with the prototypes.

Ask others to try your prototypes.

Test

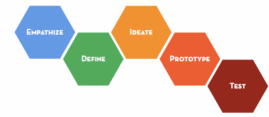
Prototypes with promise are re-made with more realistic materials.

Use observations and feedback to refine prototypes.

Learn more about the user.

Refine your original point of view.

Hemi-Gadget Design Challenge



Deliverables

Week 1:

- Understanding the Project and the Challenge
- Interview Notes
- Insights on Interview
- Point of View and Problem Statement

Week 2

- Research notes

Week 3

- Individual Ideation and Group Ideation notes and sketches

Week 4

- Prototype sketches
- Prototype (a physical representation of your idea)

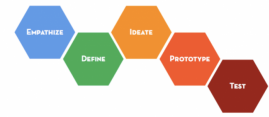
Week 5

- Pictures of prototype testing and refining

Week 6

- Pictures of building and refining final gadget
- Gadget showcase

Hemi-Gadget Design Challenge



The Innovators Mind-Set

Act: We are problem solvers, doers, creators

Learn from Mistakes: We fail fast and fearlessly, learning from each try

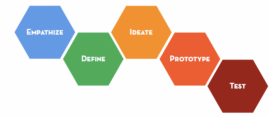
Work Together: We collaborate, creating better solutions

Contribute to the Greater Good: We improve our community and the world

Be Resilient: We don't give up

Grow: We are life-long learners

Hemi-Gadget Design Challenge

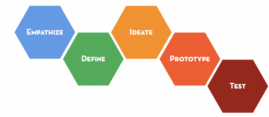


Understand before you begin

Write your current understanding of the following:

1. Innovators
2. Empathize
3. The Hemi-Gadget Design Challenge
4. Deliverables for the Challenge
5. How you will be assessed
6. Working in a group – collaboration

Hemi-Gadget Design Challenge



Your Mission: Design something USEFUL & MEANINGFUL for a hemiplegic person. Start by **GAINING EMPATHY**.

Interview

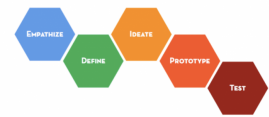
Ask the person to introduce him/herself to you.

Ask at least 3 questions.

5 minutes per TeamMember

NOTES:

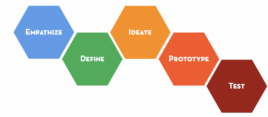
Hemi-Gadget Design Challenge



INSIGHTS:

What stood out to you?
What are you curious about?

Hemi-Gadget Design Challenge



POINT OF VIEW

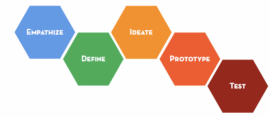
This is where you articulate (explain) your current point of view (understanding) of the problem.

Inventory possible **NEEDS**

Things they are trying to do (**needs**):

Ways they want to feel (**insight/meaning**):

Hemi-Gadget Design Challenge



Here we **DEFINE** a **PROBLEM STATEMENT**

NEEDS A WAY TO

user's need

in a way that makes him/her **FEEL**

insight/meaning

Hemi-Gadget Design Challenge



RESEARCH:

Learn more about hemiplegia by conducting some research and taking notes.

Watch at least 3 videos from the list.

Read at least 2 websites from the list.

[Take notes here.](#)