

Initial Design Plan

Teams should complete this form after they have identified constraints and criteria and settled on their solution, but before doing any building. The Initial Design Plan is their entry ticket into the building phase and provides evidence of planning and connecting back to the design space.

Team members and job titles

Criteria: List the top five things your team must keep in mind to develop a good solution. List these criteria in order from the most important to the least important. Use a Design-Ranking Form to complete this section.

The solution's four most important features:

1.

2.

3.

4.

The solution's least important feature:

5.

Constraints: What limitations and requirements must the solution meet? List no more than six constraints.

Design statement: What will your team do to develop a solution for the problem? You may draw a sketch, or create bullet points or paragraphs to create a clear picture of your plan.

Meeting criteria: How will your proposed solution meet the identified criteria? Specifically name the criteria and the ways they are being addressed. Use the list form to complete this section.

Science concepts: List any science concepts you need to understand and apply to meet this challenge.

1.

2.

Additional background information: Identify any data, statistics, cultural, or historical information you may need to research.

Anticipated problems: What issues or roadblocks will your team have to overcome to succeed? For example, how or where will you get materials? How might a scaled model inaccurately represent the actual product or solution? How do you plan on getting the information or product to the end users?