



Invention Project

PowerPoint Lesson Slides
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www.andrews.edu/go/invent

Andrews University STEM Division
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Goals for Today

Work with your team to...

- Describe the problem
- Research the problem

Project: Describe & Research the Problem

Read the Logbook for more information (pg. 8-10).

(may need to finish research next time)

Requirements

What are requirements?

- What does the solution need to do?
- What must the solution not do?
- Safety, size, weight, strength, time, cost, etc.
- Do not say how it will be solved

Project: Requirements

What are requirements?

- What things must the solution meet or do?
- What must the solution not do (limitations or restrictions for the design)?
- Consider the requirements for the solution without choosing a specific solution yet.
- The requirements will be the checklist for the invention.

Read the Logbook for more information (pg. 11).

Goals for Today



Work with your team to...

- **Finish research**
- **List solution requirements**

Project: Requirements

Show the previous slide and read the Logbook for more information (pg. 11-12).

Goals for Today

Work with your team to...

- Brainstorm solutions
- Compare solutions
- Choose the best solution
- Search for similar products

Project: Find & Choose a Solution

Read the Logbook for more information (pg. 13-15).

(this step may require extra time)

Goals for Today

Work with your team to...

- **Create invention design**
- **Build the prototype**

Project: Design & Build the Prototype

Read the Logbook for more information (pg. 16-18).

(this step may require several days)

Goals for Today

Work with your team to...

- Continue/finish building the prototype
- Test the prototype

Project: Test the Prototype

Read the Logbook for more information (pg. 19-20).

(this step may require several days)

Goals for Today

Work with your team to...

- Improve the prototype
- Run new tests
- Finalize the prototype

Project: Improvement

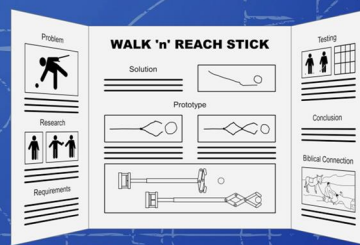
Read the Logbook for more information (pg. 16-20).

(this step may require several days)

Goals for Today

Work with your team to...

- Write Logbook conclusion
- Prepare for presentation



Project: Wrap-Up

Read the Logbook (pg. 21-22) and the Presentation Guidelines (available on our website, Presentation Resources section in Teacher Resources) for more information.

(additional resources available in the Presentation Resources section)