

Lesson Plan

Computers: Then and Now

Book: *Inventing Computers*

Series: Amazing Inventions

Level: Beacon

Objective

To help students explore the jobs and parts of computers from the past, and to brainstorm ways that computers could be used in the future.

Supplies

- *Inventing Computers* book
- “First Computers” page from the DK Findout website:
<https://www.dkfindout.com/us/science/amazing-inventions/first-computers/>

Before the Activity

Pull up the DK Findout web page in your web browser.

Activity

Read Chapter 2 (“History of Computers”) of *Inventing Computers* out loud. This chapter explains some of the first computers that people created. After reading the text, turn back to the beginning of the chapter and choose a volunteer to read the caption on page 9: “Many computers are based on counting machines invented by Charles Babbage.”

To learn more about these early machines, pull up the DK Findout web page. Read the paragraph on the left side of the page. Like the image on page 8 of the book, the picture on this web page shows one of Charles Babbage’s counting machines. Click the labels to learn more about the different parts of this machine and what it was built to do.

Next, scroll down to the paragraph about desktop computers. Choose a student to read this paragraph out loud. Then discuss the following questions:

- What was Charles Babbage’s counting machine built to do? (Answer: It was made to do complex math.)
- Where were the first personal computers used? (Answer: They were used by businesses and schools.)
- What are some places or ways that people use computers today? (Sample Answers: People use computers to do work at their jobs, to learn at school, and to play games at home.)

- What are some places or ways computers might be used in the future? What would help make these computers good at their jobs? (Sample Answer: Computers might drive cars or do other tasks automatically. Sensors or AI could help these computers collect information and make quick, accurate decisions.)

Evaluation

Could students recall how people used computers in the past? Could they brainstorm how people might use computers in the future? Could they identify parts or traits that would help computers do those jobs?

Standards

This lesson may be used to address the Common Core State Standards' reading standards for informational text, grade 3 (RI 3.1, 3.7), and the National Science Education Standards' Content Standard E, grades K–4.