Podcast Activity Guide

Description
Prototype Online: Inventive Voices is a podcast series from the Smithsonian’s Lemelson Center for the Study of Invention and Innovation. The series is primarily based on lectures, demonstrations, and interviews by and of renowned inventors and innovators sponsored by the Lemelson Center since 1995. It reveals the stories behind the inventions — motivations, successes, and disappointments — and highlights the persevering spirit shared by all who call themselves “inventor.” For more information about the Lemelson Center and this podcast, please visit the Center’s website at invention.smithsonian.org.

These podcasts can help students gain a broader understanding of invention and inventors, and can lead to a greater understanding of invention’s important role in American history and culture. While this listening guide was designed to accompany the four podcasts listed below, it can also provide a starting point for using and discussing any podcast in the Prototype Online series.

- Brad Brewer animates the inanimate
- Deanne Bell believes engineering is for girls
- Nate Ball, inventor and co-host of Design Squad
- Chuck Hoberman inspires the next generation (Part 2)

Before Listening
Explain to your students that they will be listening to a podcast interview with an inventor. Lead them in a discussion about invention using the following questions as a guide:

- What is invention?
- Can you name an American inventor of the past?
- Do you know of an inventor working today?
- Identify at least 5 inventions in your classroom. What needs do these inventions fulfill or what problems do they solve? What (if anything) did people use to solve these problems before these inventions were available?
- Do you think of yourself as an inventor? Why or why not?
- What behavioral traits and technical skills do inventors have?
During Listening
Ask students to take notes highlighting what they feel are the most important points. Some specific things to listen for may include:

- The inventor’s name
- What he/she has invented or worked on
- What inspired him/her to become an inventor
- The inventor’s childhood interests or hobbies
- Challenges this inventor faced
- Special training or knowledge this inventor has
- Any unfamiliar words

After Listening
Look up any new words and discuss their meanings within the context of the podcast. You may also want to print the transcript of the podcast so students can see the words as they were used.

Lead a discussion about the podcast using the following questions as a guide:

- What was the most interesting part of the interview?
- Did you find anything in the interview surprising?
- Has your idea of invention changed?
- Has your idea about who can be an inventor changed after listening to the podcast?
- What needs or problems does this inventor’s work address?
- What special skills or knowledge does this inventor have to do his/her work?

Based on the interview, create a timeline of the inventor’s life, indicating the significant events that he/she mentioned. (The transcript of the podcast may help students in preparing the timeline.) What questions do you still have about the inventor? Using both print and digital sources, research him/her (or his/her invention) and add the new information to the timeline.

Listen to other Lemelson Center podcast interviews with inventors and compare and contrast the inventors’ stories and experiences.

Tell Us What You Think
Let us know what you think about our podcasts, this guide, or how you have used it in your classroom. Send an email to us at lemcen@si.edu.