Activity Guide for Students: A Century of Science Podcast

Directions:
In this activity, you will use the Science News archive to do research for a podcast program highlighting changes in science over the last century. The program will include four to five podcasts and at least one interview with someone who remembers the impact of a discovery or technology featured in your podcast. Each episode will focus on one significant discovery or achievement.

Your class will first learn how to use the Science News archive and consider how scientific discoveries have changed society over the last 100 years. There will also be a class brainstorming session to discuss fields from 100 years ago that still exist, as well as fields that are relatively new.

Following the discussion, your teacher will divide the class into groups, which will research and create podcasts as homework. Your group will present your podcast program during the next class.

Class discussion
Discuss the following questions with your class.

1. What fields of science do you think exist today that did not exist 100 years ago?

2. Thinking of fields that existed 100 years ago, how similar are the topics and tools used in the fields today compared with those used back then?

3. What helped those science fields become what they are today?

4. What scientific discoveries or societal events helped shape that change?

Podcasts
After your class has brainstormed and reviewed scientific fields, you will form groups of three or four and pick a field to research for your podcast program. The research and creation of the podcasts about a specific field will be done as homework.

Your group will make four to five episodes that together will last 15 to 20 minutes. The individual episodes can vary in length. Each mini-podcast should target a significant advancement, discovery or achievement. Note that some fields may have quickly advanced with many related discoveries that could be described in the same mini-podcast. Use the template below to plan the content and to identify visuals that illustrate big ideas covered in the episodes.
When writing your podcast scripts, consider the following questions.

1. What was the major experiment/discovery, and who was responsible for it?

2. Were there any major world events that affected the field in which the discovery was made?

3. Who are you interviewing — relative, neighbor, scientist or teacher — and why?

4. How did the developments or discoveries impact the interviewee or their family?

**Presentations and evaluations**
After presenting your podcast program or the episodes that you thought were the best, you will be asked to list what you contributed to the podcast and rate your fellow group members’ efforts on a rubric provided by your teacher. Additionally, you will evaluate presentations by the other groups in your class.