

The Story of NASA's Deaf Bioastronauts

The **GALLAUDET** ELEVEN

KERRY O'MALLEY CERRA • KRISTINA GEHRMANN

TEACHING TIPS

Teaching Tips for *The Gallaudet Eleven: The Story of NASA's Deaf Bioastronauts*

“We were different in a way they needed.” —Harry Larson, one of the Gallaudet Eleven. This fascinating nonfiction picture book tells the little-known story of eleven Deaf individuals who helped NASA achieve its mission to put a human on the moon. These eleven bioastronauts endured hours of testing, tilting, whirling, tossing on stormy waves, and experiencing zero gravity to help scientists understand the effects of space travel on the human body. Author Kerry O'Malley Cerra, who is deaf, incorporates quotations to highlight the voices and perspectives of the Gallaudet Eleven while Kristina Gehrmann's digital illustrations showcase the inquiry and scientific process that drive this lively narrative. A launching point for further investigations across disciplines, this title is at the ready for classroom exploration.

More About the Gallaudet Eleven

After reading *The Gallaudet Eleven* with your students, invite discussion around their responses and questions. What surprised them about this story? What impressed them? What is something new that they learned? What is something that they now wonder? Take time to read the back matter of the book together. Discuss the author's note, timeline, and additional 'fascinating facts.' Students can deepen their understanding about this remarkable group through an exploration of online resources (begin with those on the [author's website](#)), such as the article on NASA's website: [How 11 Deaf Men Helped Shape NASA's Human Spaceflight Program](#); an archive of Gallaudet University's

museum exhibit [Deaf Difference + Space Survival](#). Students may also enjoy meeting a couple of the bioastronauts via a video recording of an event honoring the group at the Houston Space Center: [Gallaudet Eleven—The Deaf Right Stuff](#). This video is particularly useful to deepen their understanding of the research project.

Bioastronautics

The Gallaudet Eleven are described as Bioastronauts, pioneers in the field of Bioastronautics, which studies how the human body reacts to and can be protected in space. This interdisciplinary field merges medicine, biology, space science, and engineering. Reread *The Gallaudet Eleven* with your students with a specific focus on bioastronautics and the scientific process. What kinds of questions were the scientists in the story trying to answer? How did they design their investigations? What kinds of experiments did they conduct? Extend this activity by learning more about bioastronautics as a field. Students may enjoy learning about the coursework in the [Harvard-MIT Health Sciences and Technology Bioastronautics Training Program](#).

Deaf Cultures

In a note to readers at the beginning of the book, Barry Gulak, one of the Gallaudet Eleven, describes how deaf people were treated during that era. Ask your students to reflect on contemporary times. In what ways does the world we live in support or marginalize the deaf? Have students learn more about deaf culture within their local communities. Invite various experts, especially members of deaf communities, to give presentations and workshops to the class. What barriers have they faced? What commitments and accomplishments motivate them? Work with your school or public librarian to share additional stories of deaf individuals, both nonfiction and fiction. Discuss how life stories real and imagined help to “build a bridge connecting the deaf and hearing communities” as Barry Gulak urges us to do.

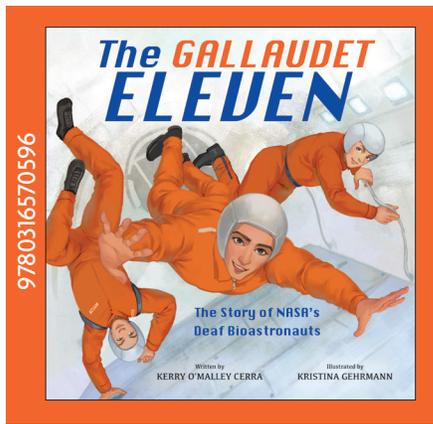


[lbschool.bsky.social](#)

[LittleBrownSchool](#)



[lbschool](#) [LittleBrownLibrary.com](#)



The Story of NASA's Deaf Bioastronauts

The **GALLAUDET** **ELEVEN**

KERRY O'MALLEY CERRA • KRISTINA GEHRMANN

TEACHING TIPS

Hidden Figures

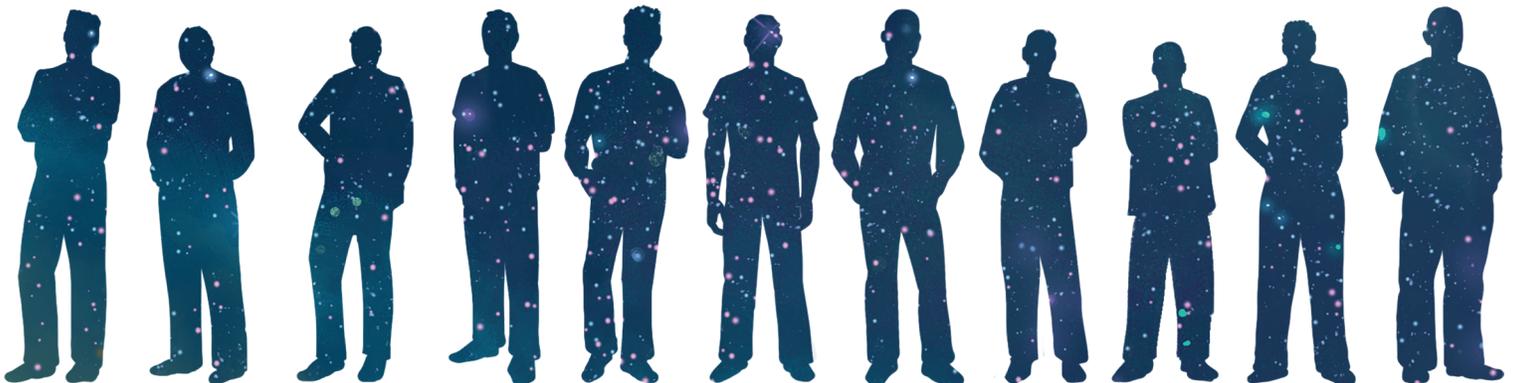
In recent years, books, movies and documentaries have highlighted the many people who contributed to the successful moon landing. Some of their stories are quite public and well known, and others are less told. Pair a reading of *The Gallaudet Eleven* with the picture book [A Computer Called Katherine](#), written by Suzanne Slade and illustrated by Veronica Miller Jamison. This biography describes the accomplishments of Katherine Johnson, an African American woman mathematician whose calculations were critical to the mission's success. After comparing these two books, ask students to brainstorm a list of what it might take to accomplish a moon landing. What kinds of challenges need to be solved? What knowledge might be needed? What character traits are desirable in the members of a team working to reach this goal? Expand the activity by conducting further inquiry about the people involved in the *Apollo 11* mission. You can find further information on [NASA's website](#) and that of the [National Air and Space Museum](#).

Breaking Boundaries: A Text Set

Work with your school or public librarian to gather a collection of texts that focus on individuals or groups, like the Gallaudet Eleven, who overcame societal boundaries, breaking taboos and countering stereotypes with their accomplishments. Divide students into groups to read titles and ask students to report on: Who is the subject of the text? What obstacles did they face? How did they overcome these obstacles? What accomplishments are they credited with? Following this text set study, invite students to consider which boundaries and taboos have yet to be broken—what are our next steps as a society toward greater inclusion?

To Be of Service

The eleven men known as the Gallaudet Eleven viewed their work as an act of national service. Engage your students in a conversation about what it means to be of service. Record their responses and sort into categories: helping families, neighbors, your community, and national/global initiatives. Invite a series of guest speakers into your classroom, featuring members who serve your community. Students should prepare for each speaker by developing interview questions that will support their understanding of what the speaker does. Photograph each speaker and work with students to create a written description of what they learn. Then ask students to select a way in which they do or plan to help others or their environment and write about their efforts. Share students' work with family and school community members so they have lots of support to continue or to implement their efforts.



These Teaching Tips were created by Erika Thulin Dawes, Ed.D., Professor of Language and Literacy

