

Governing in Crisis Teaching Guide

Former Senior Chancellor Arthur Levine Battling COVID-19 with the Power of Science

Interview Summary

Arthur S. Levine recently completed more than 21 years of distinguished service as the Senior Vice Chancellor for the Health Sciences and John and Gertrude Petersen Dean of the School of Medicine at the University of Pittsburgh. He now serves as Executive Director of the University's Brain Institute and Professor of Medicine, Molecular Genetics, and Neurobiology. Before coming to Pitt, Dr. Levine spent more than three decades at the National Institutes of Health, including sixteen years as the scientific director of the National Institute of Child Health and Human Development. He discussed the defining characteristics of the scientific method, the role that science has played in human progress including the enhancement of human health, and the critical impact of the federal government in advancing the health sciences through work done in such agencies as the NIH, CDC and FDA. He also talked about the nature of the COVID-19 disease and efforts to develop a vaccine.

Watch or Listen to the Episode using your favorite video or podcast app: *YouTube, iTunes, Spotify, Google Podcast, Stitcher, Amazon Music.*

The Governing in Crisis series videos, podcasts, and resource materials are available at: *www.iop.pitt.edu/governing-crisis.*

Video Topics

- □ (0:00) Introduction
- □ (4:34) Establishing understanding through science
- □ (12:20) The causes and impacts of bias in science
- □ (22:16) The role of federal health agencies and the challenges they face
- □ (39:22) Developing a COVID-19 vaccine

Potential Uses

- □ Post a governance series video on Canvas and ask students to respond to a discussion question about the video, as well as comment on 1-2 of their classmates' posts.
- □ Show a clip of the video during class to enrich learning, emphasize a point, and/or contextualize a topic.
- □ Create a resource folder on Canvas that includes governance series videos, accompanied by "learn and do more" documents, as well as other links to support student growth related to current events.
- □ Incorporate a governance series video into pre-class readings for a live discussion using or adapting the questions below.

Suggested Written Reflection Questions

- □ Implicit biases are favorable and unfavorable attitudes and stereotypes that unconsciously affect a person's understanding, actions, and decisions. According to Dr. Levine, what impact do implicit biases have on the scientific method? What unconscious biases do you have, or have you experienced? How can biases impact your work?
- □ The interview with Dr. Levine was released on June 1, 2020. Based on what Dr. Levine stated then, identify what has changed and what has remained the same with regards to the COVID-19 pandemic.
- □ What did you find interesting in the interview? What is something that you disagreed with?

Suggested Classroom Discussion Questions

- According to Dr. Levine, what is the scientific method? How does it help us build our scientific understanding? What is the role of clinical trials within the scientific method? Why is it important to build our understanding of situations and processes before making public health and/or policy decisions?
- □ Misinformation can have determinantal consequences, especially when it concerns public health. Identify examples from the video that demonstrate the dangers of misinformation. How has misinformation impacted health officials and the general public's response to public health concerns?
- □ In speaking about the use of face masks to protect against the spread of COVID-19, Dr. Levine highlights the ongoing controversy over an individual's rights versus society's rights. Are there instances where public good should outweigh individuals' rights?
- □ First, briefly describe the roles of the CDC, FDA, and NIH. How are these three agencies similar? How are they different? Second, identify what responsibilities these agencies have in combating COVID-19.
- □ The COVID-19 pandemic has disrupted the world. It has resulted in thousands of deaths, economic downturns, and political instability. According to Dr. Levine, what makes the COVID-19 pandemic particularly dangerous?

Related Reading

- □ Read the American Heart Association's article "COVID-19 and Cardiovascular Disease" to understand the relationship between COVID-19 and Cardiovascular Disease.
- □ Had social distancing had been in place seven days earlier, a *Columbia University study* found that the United States could have prevented 36,000 deaths through early May. As of Sept. 2020, over 200,000 COVID-10 related deaths have occurred in the United States.
- □ The FDA provides a brief outline of the 5 step *Drug Development Process*.

Stay Informed via Social Media

- iop.pitt.edu Æ
- *thornburghforum.pitt.edu*



@DickThornburghForum @PITT IOP



Institute of Politics Institute of Politics

Please fill out this quick survey to let us know if you used any of the Governing in Crisis videos and share your feedback. The survey can be accessed here.