Rising to the Challenge
The Mayo Aero Medical Unit in World War II

In December 1941, America went to war. Factories began turning out thousands of the most powerful fighter planes and bombers ever made. But aviators were flying faster and at higher altitudes than the human body had ever experienced. Pilots were crashing from “oxygen want” and blackout.

A team at Mayo Clinic built a new laboratory to search for solutions. Racing against time, Mayo doctors and technicians developed life-saving procedures and devices that gave Allied fighter pilots and bomber crews a decided advantage in the war. In the process, they opened new horizons for human flight.

Discussion Questions
1. Why do you think Mayo Clinic took a strong interest in the field of aeromedicine when aviation was a relatively new industry?

2. The wartime aeromedical work involved collaboration between the military, medical and scientific organizations, and even commercial firms that were competitors in peacetime. What lessons can we take from that successful experience for today’s cooperative ventures?

3. What particular strengths did Mayo Clinic bring to this work because of its values and culture?

4. The aeromedical research was urgent and had high stakes. In what ways do you think that sort of pressure helps or hinders scientific progress?

5. The researchers were steered by feedback from the ultimate users of the G-suit and oxygen mask. How important should provider and patient input be in the development of medical innovations and when should it occur?

6. Planes flying faster and higher led to new medical issues for aviators. What issues requiring medical solutions do you think may arise from technologies being developed today?