

BLOCK 2 OF INSTRUCTION: Becoming a Researcher

OVERVIEW: There are multiple paths to becoming a medical researcher. Some people enroll in MD-PhD programs, others enroll in MD or PhD programs. There are also various reasons why individuals go into a career in research. This block gives participants a taste of how various researchers have come to the field and why.

OBJECTIVES:

- Give the participants a basic understanding of the various pathways to becoming a medical researcher.
- Provide insight into why researchers have chosen this field.
- Explain the needs of and for the future research workforce.

SUGGESTED PRESENTERS:

- Dean of research
- Research training program directors and leaders (PhD, MD-PhD, postdoctoral, and physician-scientist training programs)
- Research assistants
- PhD and MD-PhD candidates
- Postdoctoral trainees
- Clinical research fellows
- Training program faculty

SUGGESTED TIME: 1 hour

KEY TOPICS:

- Provide an overview of research training programs.
 - Describe the MD-PhD and PhD application process at your institution.
 - Discuss the MD-PhD track curriculum.
 - Describe how the clinical and basic science skills are balanced in the curriculum.
 - Provide an overview for a “day in the life” of an MD-PhD student.
 - Discuss the PhD track curriculum.
 - Discuss research training opportunities for MD students and pathways for MDs to become a researcher.
 - Describe the timeline for each program.
 - Describe the benefits of each pathway.

PROJECT MEDICAL EDUCATION



- Discuss other factors in becoming a researcher.
 - Discuss institutional and national efforts to support new and early-stage investigators.
 - Discuss efforts to increase the diversity of the medical research workforce.
 - Discuss the National Institute of General Medical Sciences (NIGMS) Medical Scientist Training Program (MSTP).
 - Discuss postdoctoral training.
 - Discuss the costs of an education in research.
 - Discuss student debt loads, pointing out the average debt load at your institution.
 - Discuss financing options, including federal programs for repayment.
- Provide insight into why people have chosen a career in medical research
 - What is the make-up of your institution's faculty? Are there any faculty members with unique backgrounds?
 - How does one become a faculty member at a medical school?

ACTIVITIES:

- Formally present the MD-PhD track and PhD curriculum.
- Distribute the first envelope for this module, participants' student profile for the day, containing information about a fictitious MD-PhD student enrolled at your institution or affiliate.
- Distribute the second envelope for this module, which contains participants' upcoming bill for their education, including stipends.
- Have PhD candidates, MD-PhD candidates, and faculty discuss why they chose a research career, as well as their current research interests. Conduct this as a roundtable discussion to promote interaction with the participants.

RECOMMENDATIONS:

- Include PhD and MD-PhD students, research residents and fellows, and medical researchers whenever possible.
- When recruiting presenters, select those who have a history of effective communication with lay audiences. Most PME participants come from a background with little knowledge of medical science. Presenters should not assume that the audience has knowledge of basic medical concepts. Stay away from medical jargon. Coach presenters prior to the event and encourage them to be mindful of their audience when presenting.