I think it is a common misperception that Ph.D. programs prepare scientists only for lab-based research.

Many graduate students and postdocs today are choosing to pursue careers outside of research. My transition from bench science to science policy has been exciting and fulfilling.

As a graduate student, I attended many "alternative" career workshops. Patent law, management consulting, pharma, and biotech were often presented as options, but science policy was--at least in my experience--not regularly showcased. That could be in part because the field of science policy is hard to define. In general, many groups intersect there: research scientists, government agencies and regulatory bodies, professional societies, Congress, patient groups--to name just some of the players. A job in science policy often means representing one of these groups and communicating and interacting with the others.

My career path took me from graduate school in neuroscience at Harvard to a postdoc at the University of Virginia (UVA), to my first position in science policy at the Federation of American Societies for Experimental Biology (FASEB), a coalition of 21 scientific societies representing more than 60,000 biomedical researchers. As a member of FASEB's Office of Public Affairs (OPA), I had two main roles: communicating science to policy-makers and communicating policy to scientists. I also facilitated interactions between scientists and policy-makers at conferences organized by the OPA.

At OPA, I analyzed, responded to, and helped draft policies that affect scientific research, such as FASEB's policy statements on postdoctoral training and on stem cell.
research. I monitored legislation, such as the bills related to human cloning, and educated members of Congress about the impact proposed legislation could have on scientific research. At the same time, I informed scientists about the potential impact, on their research funding and practice, of policies and legislation. As a scientist, I provided scientific expertise on issues (for example, stem cell biology) and educated the public and media about the benefits and importance of scientific research.

Recently, I have moved to a position in the Office of Science Policy and Planning at the National Institute of Neurological Disorders and Stroke, part of the National Institutes of Health. My role is similar to the one I had at FASEB, although now from the perspective of a government agency. Policies and issues related to neurological disease and their impact on the neuroscience community are central facets of my job.

How did my training prepare me for a career in science policy? I think it is a common misperception that Ph.D. programs prepare scientists only for lab-based research. In fact, the skills you acquire in the course of pursuing that degree are applicable to a wide range of professions. Don't underestimate the tremendous amount you learn from completing the long-term, largely independent project of a Ph.D. dissertation: analyzing data, making decisions, and planning with a long-range goal in mind. At FASEB and in my current position, my ability to analyze and interpret scientific information has been invaluable. As a graduate student and postdoc, I was trained to write clearly and had the opportunity to talk about science to a wide range of scientific and nonscientific audiences. I use these skills daily. In addition, my background in neuroscience, a truly interdisciplinary field, has provided me with a broad base of scientific knowledge and an interest in a range of scientific fields.

Many scientists thinking about policy work might overlook a postdoc and think it better to move into science policy directly from graduate school. Although some of my colleagues have successfully followed this path, I think the experience I gained as a postdoc was important for landing my first job. A postdoc position often affords the first opportunity to write your own grant, and for many jobs, including my current one, a familiarity with the grant-application and peer-review process is advantageous. A postdoc fellowship might also be a time to explore teaching and/or administrative duties in addition to research.

My postdoc helped broaden my research interests (I went from vertebrate developmental neurobiology to Drosophila genetics), and it also gave me direct exposure to science policy. At UVA, I was involved in a seminar course on stem cell biology for graduate students and postdocs. Out of necessity, our discussions focused not only on the science but also on the political, ethical, and legal issues of the research. I was instrumental in planning a conference that brought together scientists, lawyers, and ethicists to discuss some of the issues raised in the seminar, and this truly sparked my interest in science policy.

My transition from academia to a nonprofit organization and now the government has afforded me the opportunity to view science and policy from a number of perspectives. My colleagues come from diverse backgrounds--law, government, public relations, and scientific research--and I have learned an enormous amount from them about how scientific research is viewed by Congress and the public. I spend a large part of my day reading, writing, and talking about science--things I have always enjoyed doing. In
short, my career in science policy has been extremely rewarding, and I see many interesting avenues that my policy career might take down the road, whether I remain in government, move to the private sector, or return to academia.

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