

Canadian online survey on fundamental research

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Introduction In addition to the official data presented in Chapters 2 and 3, we also developed and ran a quantitative online survey to query Canadian researchers about their perceptions of, and experiences with, funding for fundamental research. An important aim of the survey was to provide an understanding researcher’s personal experiences and outlook on the research funding landscape in Canada. We had an excellent response to the survey, with over 1300 Canadian researchers completing it, suggesting that fundamental research funding is a high priority topic for Canadian researchers. Herein, we detail the survey questions and results.

Methods

Online Survey

The survey was open to researchers from all disciplines (e.g. science, social sciences, humanities, engineering, medicine) and career stages, with the proviso that they had some experience applying for research funding. The survey gathered detailed information in four major areas: 1) the types of research the scholars conduct (fundamental, use-inspired, applied), 2) the extent of external partnerships in their research, 3) their grant success rates, and 4) their perceived importance of fundamental research to the Canadian federal government and of its future prospects in Canada. The survey also enquired how each of these factors have changed over time. Finally, the survey gathered basic information from each respondent about gender, discipline, career stage and the year their PhD was obtained. The full survey is provided in Appendix XX.

The online survey was open from the end of May through early October 2016, and ran on the Fluid Surveys platform (fluidsurveys.com). Note that the survey was open to researchers from any country in the world because it is was run as part of a global survey through the Global Young Academy. To disseminate the survey to Canadian researchers, we gathered email addresses from Canadian university websites for as many faculty members as possible and emailed individual researchers directly. We also shared the survey broadly on social media, as well as through the Global Young Academy network, on scientific list serves, and through personal connections.

Survey Data Analysis

To extract survey responses for Canadian researchers, we selected all respondents who reported ‘Canada’ as their country of work, as well as those respondents who did not report a country of work (i.e. field was blank) but whose location was within Canada. We conducted all statistical analyses in the open source software R. . . .

Results

In total, 1283 Canadian researchers completed the online survey. Of these, almost three quarters were male (74%) and one quarter were female (25%); a very small proportion either did not input their gender or selected other. Almost all of the survey respondents (94%) were either senior academics (66%), defined as those researchers with more than ten years experience applying for research grants since completion of their PhD, or early career academics (29%) (Figure 4.1). The remainder of responses came from post-doctoral researchers (4%), non-academic researchers (2%), or those who did not indicate their career stage (0.4%).

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