

APR12-2012-000999

Abstract for an Invited Paper
for the APR12 Meeting of
the American Physical Society

Limited Resources, Limited Opportunities, and the Accumulation of Disadvantage: Evidence from the Global Survey of Physicists¹

RACHEL IVIE, American Institute of Physics

Using the results of the Global Survey of Physicists, which we conducted in collaboration with the International Union of Pure and Applied Physics Working Group on Women, we document the effect of limited resources and opportunities on women physicists' careers. We find that women respondents are less likely than men to report access to a variety of resources and opportunities that would be helpful in advancing a scientific career. These include access to funding, travel money, lab and office space, equipment, clerical support, and availability of employees or students to help with research. When asked about specific opportunities, women report fewer invited talks and overseas research opportunities. Women who responded are less likely to have been journal editors, acted as bosses or managers, advised graduate students, served on thesis or dissertation committees, and served on committees for grant agencies. We also show the disproportionate effects of children on women physicists' careers. Women who responded are more likely than men to have changed their work situations upon becoming parents. Mothers are more likely than men and women without children to report that their careers have progressed more slowly than colleagues who finished their degrees at the same time. Furthermore, women are more likely than men to report that their careers affected the decisions they made about marriage and children. The results of this survey draw attention to the need to focus on factors other than representation when discussing the situation of women in physics. 15,000 physicists in 130 countries answered this survey, and across all these countries, women have fewer resources and opportunities and are more affected by cultural expectations concerning child care. Cultural expectations about home and family are difficult to change. However, for women to have successful outcomes and advance in physics, they must have equal access to resources and opportunities.

¹Supported by the Henry Luce Foundation