

# **BREAKING BIAS**

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## SCIENCE

# Female Leadership Raises Aspirations and Educational Attainment for Girls: A Policy Experiment in India

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Exploiting a randomized natural experiment in India, we show that female leadership influences adolescent girls' career aspirations and educational attainment. A 1993 law reserved leadership positions for women in randomly selected village councils. Using 8453 surveys of adolescents aged 11 to 15 and their parents in 495 villages, we found that, relative to villages in which such positions were never reserved, the gender gap in aspirations closed by 20% in parents and 32% in adolescents in villages assigned a female leader for two election cycles. The gender gap in adolescent educational attainment was erased, and girls spent less time on household chores. We found no evidence of changes in young women's labor market opportunities, which suggests that the impact of women leaders primarily reflects a role model effect.

# Gender diversity leads to better science

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Pick up any recent policy paper on women's participation in science and you will find assurances that gender diversity enhances knowledge outcomes. Universities and science-policy stakeholders, including the European Commission and the US National Institutes of Health, readily subscribe to this argument (1–3). But is there, in fact, a gender-diversity dividend in science?

The data suggest that there is. Under the right conditions, teams may benefit from various types of diversity, including scientific discipline, work experience, gender, ethnicity, and nationality. In this paper, we highlight gender diversity (Fig. 1). Guided by key research findings, we propose the following

"mechanisms for innovation" specifying why gender diversity matters for scientific discovery and what managers should do to maximize its benefits (Fig. 2). Encouraging greater diversity is not only the right thing to do: it allows scientific organizations to derive an "innovation dividend" that leads to smarter, more creative teams, hence opening the door to new discoveries.

## Productive Team Mechanisms

Well-run, well-performing research teams have become increasingly crucial to the success of modern scientific investigations. Already, experimental research points to positive links between gender diversity and collective



## Do Pro-Diversity Policies Improve Corporate Innovation?

**Roger C. Mayer, Richard S. Warr, and Jing Zhao\***

*Using new product announcements, patents, and patent citations as measures of corporate innovation, we find that corporate policies that promote more pro-diversity cultures, specifically treatment of women and minorities, enhance future innovative efficiency. This positive effect is stronger during economic downturns and in firms that are more innovative, value intangibles and human capital more highly, have greater growth options, have higher cash flow, and have stronger governance. Pro-diversity policies also increase firm value via this stimulating effect on innovative efficiency. Our results suggest a channel through which workforce diversity may enhance firm value.*





Which line is  
the same  
length as X

A  
B  
C





**WHY AREN'T THERE MORE  
FEMALE BUSINESS PROFESSORS?**

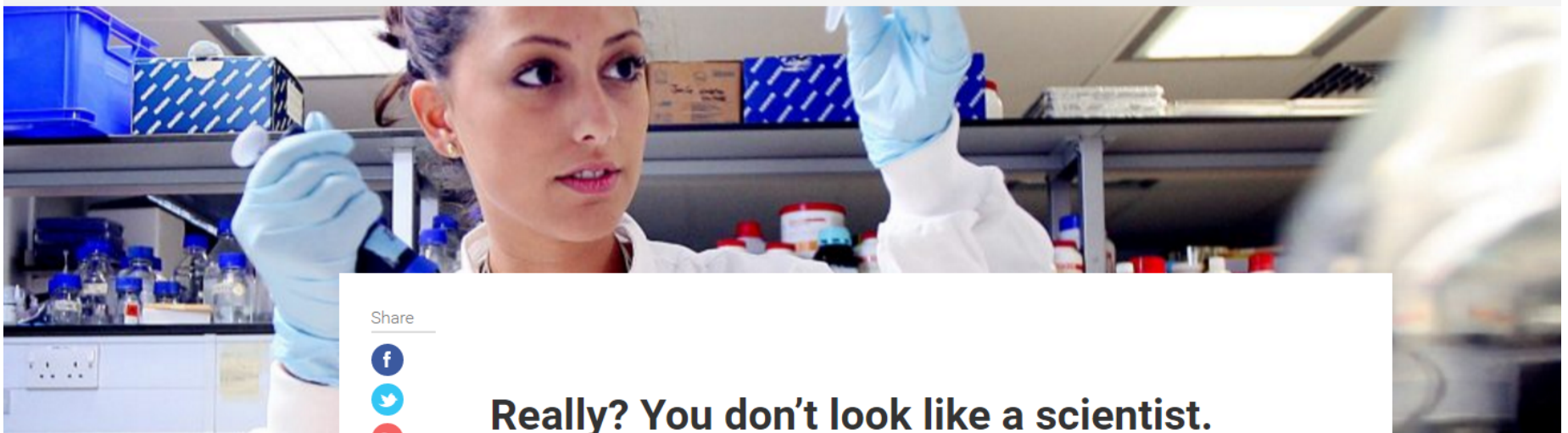


A photograph of a dense, vibrant green forest covering a hillside. The trees are reflected in a calm body of water in the foreground. The sky is a clear, bright blue.

**WHY AREN'T THERE MORE PEOPLE  
OF COLOR IN THE GREEN SECTOR?**



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## Really? You don't look like a scientist.

20th July 2016 by [Katherine Lindemann](#)

Research shows women who look feminine are judged less likely to be scientists.

*Women in science have plenty of anecdotal evidence that looking feminine and "looking like a scientist" at times seem mutually exclusive. They've revealed their professions at parties to be met with surprise, been asked where the professor is in their own university offices, thought maybe they shouldn't wear a dress to that conference. Now there's scientific evidence as well. [A recent paper](#) in the journal *Sex Roles* reveals that people viewing photos of real researchers are more likely to associate women with non-science occupations if they appear more feminine. Lead author [Sarah Banchevsky](#) of the University of Colorado Boulder tells us more.*



# DIFFERENT STANDARDS FOR DIFFERENT SEXES

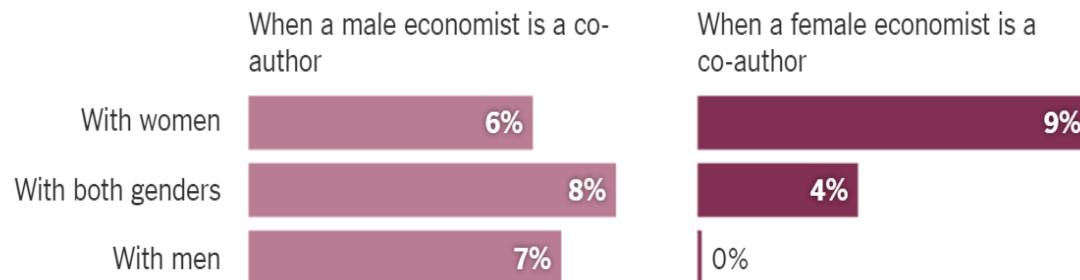
- What's more important for a police officer? Street smarts or education?
- It depends on which qualifications the woman has...
- What's more important for a construction manager? Education or work experience?
- What's more important for leadership? Social skill or competence?
- What's more important for a professor? Publications or prestige?



## Who Gets the Credit for Collaboration?

Women get full credit, in terms of earning tenure, only when writing papers with other women. Writing one with a man has no impact on the female author, only the male.

### Effect of writing an additional paper on the probability of earning tenure



Source: Heather Sarsons, "Gender Differences in Recognition for Group Work"

Solo authored papers contribute to one's chance of getting tenure at 8-9%

## PERFORMANCE EVALUATIONS

### Looks Like Women Code Better Than Men, if No One Knows They're Women

A look at GitHub puts the work of women in computer science in a new perspective.



BY KIMBERLY WEISUL Editor-at-large, Inc.com @weisul



3 COMMENTS



GitHub study shows that women's code was accepted 4% more than men's  
Women used-gender neutral profiles 71.8%  
When it was clear she was female 62.5%

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The Worst Thing That Could Happen to Facebook is Already Happening





1970, the top five orchestras in the U.S. had fewer than 5% women. Today, some... are well into the 30s.”

## PERFORMANCE EVALUATIONS

Journal called *Behavioral Ecology* switched to double blind review and there was a significant increase in women first authored publications



# BLINDING IN ACADEMIA

Difficult to interrupt gender bias through training

Structural changes are needed like transparency

We did with an accounting firm who implemented blinding and targets



And we did it at Leeds