I became a member of SSSA in the early 1980s when I was a graduate student. I have been a member ever since, have attended most Annual Meetings, and participated in Society governance. My graduate adviser had stressed to me how important professional identity and affiliation with SSSA was to my career trajectory. I believed him unconditionally. Decades later, professional societies are struggling to bring in new members. It is true that technology has generated different tools for networking, information gathering, and knowledge dissemination. This does not explain, however, why so few students, especially women, are willing to follow in our footsteps professionally. Indeed, although women comprise about one-third of the student members in three Societies, they account for only 10 to 17% of active memberships (McIntosh and Simmons, 2008).

Data from the National Science Foundation show a similar trend (Burelli, 2008). Women now earn 40% of the Ph.D.’s in science and engineering, yet leave science at double the rates of their male counterparts (Preston, 1995). Even fewer women make it to the highest academic rank (Mason et al., 2013; Valian, 1999). Let’s admit it, science is still very much a man’s world. What causes women to turn their backs on science? More importantly, do professional societies play a role in staving this trend by supporting the scientific career advancement of all its members, men and women alike?

There are those who believe that conversations about gender have no place in science. After all, overt discrimination is a thing of the past and AA/EO policies have created a level playing field that affords women the same opportunities as men to compete for resources and to succeed professionally. Science functions as a gender-blind meritocracy where scientific achievement is judged on the basis of individual skill with objective criteria and quantitative metrics, irrespective of gender. If some women are less successful, so it goes, it is because they are simply less productive, divert their attentions elsewhere, or choose to not fully commit to their careers. In other words, the unequal career advancement largely reflects personal choices or shortcomings, not flaws in the system (Ceci et al., 2014).

Scientists Are Social Beings

But this perspective ignores the fact that even hardcore scientists are social beings that operate within a social context. For one, relying on seemingly objective criteria in the evaluation of a scientist’s accomplishments does not necessarily imply absence of bias. After all, decisions are made by humans not computers, and as humans, we constantly draw upon social and cultural norms and values that cause us to express biases we may not be aware of. Whenever I bring this issue up at my university, my male colleagues become defensive, as if I am accusing them of something unsavory. Far from it. In reality we all do this, men and women alike, in the way we interact with and evaluate others.

When we meet new people, we unconsciously and automatically group them into those that are like us and those that are different from us (Reskin, 2000). Given the choice and without rules guiding our behavior, we will display a preference for those who are more similar to us, for example, in terms of gender, ethnicity, social class, or scientific field or academic affiliation. This is called implicit or unconscious bias. Because we all do this, is it not better to be aware of this and use mechanisms to guard against biases creeping in when we make important decisions? Indeed, as scientists, shouldn’t we hold ourselves to the highest standards to ensure such biases cannot shape our evaluations of other scientists?

Social scientists have discovered that the operation of unconscious bias within work organizations can contribute to unequal outcomes in terms of career mobility between men and women, often unintended. Gendered norms enter into the way...
Why Is This Important for Our Societies?

Why should we concern ourselves with gender equality in our Societies? After all, we have made significant progress over the last decades. The number of women joining ASA, CSSA, and SSSA has steadily risen since the 1970s (McIntosh and Simmons, 2008); women have been elected to the top spots, that of society president; and women are receiving awards and are selected as Fellows in increasing numbers. If one asks: Why so few and why so slow? Do we hold up the success stories of exceptional women such as Betty Klepper to convince ourselves that no further introspection is needed in the way we do business?

Professional societies play a crucial role in the career success of their members by creating opportunities for networking and through formal recognition of a scientist’s achievement via awards and honors. The prestige and increased visibility that come from being elected Fellow or receiving a named award is one of the key elements in the construction of excellence and the peer validation of scientific contributions. Such peer recognition often translates into rewards at the scientist’s home institution in the form of promotions, raises, or increased resource access.

A recent study by the Association for Women in Science in collaboration with several scientific and professional societies (ASA, CSSA, and SSSA not among them) found that women are still grossly underrepresented among winners of prestigious awards and prizes that recognize scientific achievement. Some will invoke “the pipeline” or society demographics, i.e., there are simply not enough eligible women to be recognized. Although the number of women receiving the highest recognition has indeed increased over time in most societies, the proportion of women recipients is still well below expected rates based on their academic rank, their seniority within the society, or even the relative composition of the nomination pool. Our three Societies are no exception. Only a few women were elected Fellow prior to 2000, and major progress was made in the last 15 years, with 30 (ASA), 13 (CSSA), and 24 (SSSA) women attaining this distinction. There is cause for optimism; however, these numbers still amount to fewer than 10% of all Fellows elected during that period and remain well below the availability based on the gender distribution of Ph.D.’s granted 30 years prior (Burelli, 2008). Only SSSA has been approaching that target in the last four years.

In the absence of formal guidelines, people will rely on cognitive shortcuts that cause them to preferentially nominate candidates that have attributes more similar to themselves. That is why it is so difficult for numeric minorities, including women, to even make it into the nomination pool; not because they are less qualified, but simply because their accomplishments are overlooked or given more scrutiny. Even if nominated, it is not a given that equally qualified women will be evaluated as par with their male counterparts. Several studies have shown that being visible as women in an otherwise male-dominated pool is a disadvantage when the value or importance of their work is evaluated. Parity increases when gender identifiers are removed. Furthermore, heavy reliance on letters of recommendations rather than lists of objective prerequisites, tends to skew the process even further. Recent studies that systematically analyzed reference letters reveal important differences based on the gender of the nominee, irrespective of gender of the person providing feedback (Trix and Psenka, 2003; Schmader et al., 2007). Letters for men are longer and contain more status terms and standout adjectives that speak to professional aptitude and are typically associated with excellence, such “outstanding,” “brilliant,” and “talented.” Letters for women tend to highlight personal traits in line with the notion of women as caring, such as “reliable,” “dedicated,” and “dependable.” Thus, if the selection committee is looking for clear indicators of excellence in letters of recommendation, they are less likely to find them among women nominees.

Is it not good science to consider these research findings (even if coming from a different field), ponder the implications, and use this newly gained insight to implement best practices within our own organizations? Although the So- continued on next page
Gender Equity continued from previous page

Societies have made major strides in increasing women’s participation, gender equity deserves our due attention. This requires reflection on and revision of awards-related Society practices, with special attention to increasing committee diversity and disseminating solicitations in a range of ways to tap into a diverse pool of nominees. Implicit gender bias can further be counteracted by clearly defining the desired qualifications, formalizing the evaluations, and making committees accountable for the criteria used in the decision-making process (Reskin, 2000). Can we afford to ignore the innovation and dynamism that emerges from diversity?

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References