

The Value of Title IX`

This guest editorial is by Prof. Richard N. Zare, Chair, Department of Chemistry, Stanford University.

Title IX of the Education Amendments of 1972 states that “*No person in the United States shall, on the basis of sex, be excluded from participation in, be denied the benefits of, or be subjected to discrimination under any education program or activity receiving Federal financial assistance*”. Although this language was acceptable to the Congress in 1972, it seems that in 2009 it is not to C&EN staff member David J. Hanson who wrote an “insights” column on “Targeting Gender Equity in Science” in the August 24th issue of C&EN. In this opinion piece, Hanson expressed several concerns, including: (1) Title IX was no longer necessary, (2) Title IX was now inappropriate because the real problem is too few men entering STEM fields, and (3) enforcing Title IX could lead to quotas limiting the number of men who could major in a subject. I think that these opinions are so far off the mark that they deserve a reply.

One problem with David Hanson’s critique is that he misconstrues the purview of Title IX. He has apparently followed discussions in sports pages and assumed that Title IX only applied to student access to institutional programs. Others have shared this misunderstanding, which led to the 1987 Congressional amendment clarifying what is intended by “program or activity”. This amendment clearly specifies that the prohibition on sex discrimination includes *all the operations* of an educational institution, governmental entity, or private employer that receives federal funds. In fact, most recent initiatives to strengthen Title IX activities have little to do with student admissions, curricula, or sports teams. Instead, they are intended to shine a spotlight on persistent problems in recruitment and retention of women faculty.

The faculty gender gap in chemistry departments is hard to miss. The most recent ACS annual survey (C&EN 85:40-41; 2008) noted that among the top 50 chemistry departments, women average only 16% of the faculty. NSF data on chemistry doctorates awarded to US citizens and permanent residents show that over 25% of chemistry PhDs have been women since 1990, but women currently average only 12% of full professors and 22% of associate professors in the top 50 departments. As the 2008 C&EN report noted, progress may be steady, but it is very slow. One of the best ways to speed things up is to focus attention on the problem, which is precisely what Title IX scrutiny is intended to accomplish. Some departments are further along than others: 14 in the top 50 have at least 20% women. But others are lagging, with 7 departments having no more than 10% women faculty. At this low level, the few women who are on the faculty are often isolated, and the students lack female role models. These departments may or may not wish to contemplate how few women faculty they have, but their female students are undoubtedly impacted. If the government carries out Title IX analyses and makes this information publicly available, then this should help bring lagging Departments up to speed.

What about the claim that the “real problem” is U.S. men rejecting chemistry? Hanson’s suggested response to this problem is to keep it difficult for women to enter the profession. The logic in that position is curious. Faced with fewer U.S. male chemists, we should put more efforts into increasing the number of chemists, both male and female. We would also do well to ponder why men are abandoning chemistry careers and ask whether men are influenced by some of the same considerations that discourage women from entering the field. Issues of work-life balance loom large for this generation of U.S. professionals, and younger men are not immune to these pressures. By evaluating how we can make chemistry careers more family friendly, we are likely to make these careers more attractive for both sexes.

. Extrapolating from the much publicized legal battles in institutional expenditures for sports teams, Hanson conjures the vision of “men be[ing] told they can’t study computer science because not enough women are studying the subject.” But, he acknowledges that women make up more than half of the undergraduate chemistry majors these days. Therefore, we need not take seriously his quota concerns.

Instead, we should be paying attention to the sharp decline in the proportion of women among U.S. chemistry students that occurs between BS and PhD as well as between the PhD and a postdoctoral position. NSF data show that women were 52% of U.S. residents earning chemistry baccalaureate degrees in 2006, but they were only 35% of PhD recipients and 20% of post-docs. Why such a disproportionate loss of female students during graduate and postdoctoral training in chemistry? We hear reports of women graduate students and post-docs assigned the least promising research projects, or told that cannot succeed as chemists if they have children. But without data generated via Title IX studies, these are just anecdotes. If these inequities are indeed rare, we may rejoice. If they are significant, let’s fix them. Title IX can help us do just that. I understand that some may fear the imagined consequences of Title IX, but I hope we can all agree on the value of learning why careers in academia continue to be unattractive to women.

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