

Faculty Versus Student Turnover Rate Left Out of Gender Equity Analysis

To the Editor:

I was appalled when I read the lead article in Science Policy in the September 2008 issue of *MRS Bulletin* (Vol. 33, No. 9, p. 822). "Materials Community Examines Gender Equity," by Ashley Predith, summarizing the discussion at a recent Workshop on Gender Equity in Materials Science and Engineering, appropriately focuses our attention on an important issue and reminds us that we have more to do to bring women into our profession at all levels of the education stream. Many of us have long recognized this problem and have worked aggressively to address a situation that was far worse 20 years ago. Over these two decades and longer, affirmative action in hiring has been a component at universities as well as at government and industrial laboratories. Can we do more? Certainly the answer is yes, but not if we use bad data and misperceptions to guide our actions.

I believe that in analyzing our efforts in this hiring area, accurate data is impera-

tive, and that a scientific journal such as the *MRS Bulletin* should play a particularly important role by presenting the case with clarity and accuracy. Unfortunately, the data quoted in this article is misleading and inappropriately displayed. Shown in the accompanying figure is a comparison of the percentage of women receiving BS or PhD in MSE degrees with the percentage of women in faculties of MSE departments. The workshop and this article then conclude that we must be doing something very wrong in our hiring and retention practice because the latter number is so much smaller than the former ones. We may indeed be doing things wrong, but one cannot justify that from this "apple and orange" data comparison.

To clarify, I note that the "tenure" of students in both the BS and PhD programs is ~4-5 years while the tenure of faculty is ~10 times greater. That means a 20-25% turnover in students every year but only a 2-2.5% turnover of faculty each year. Each year offers an opportunity to dramatically increase the percentage of women in undergraduate and graduate programs, while only a small impact may be made

on the percentage of women in faculties. A crude linearization of the data presented in the article and a bit of algebra reveals that hiring in recent years is approximately at the same percentage of women as the graduating PhD level.

Many of the attitudes and behavior suggested in the article as reasons that we "overrate men over women" may be correct, but if hiring is at the same rate as in the available market, they may not really apply to today's reality in MSE departments. Perhaps we should be engaged in a still more aggressive affirmative action program, but we should not castigate ourselves as if we were all still actively (or even unconsciously) discriminating in hiring (as was certainly once the case).

LYLE H. SCHWARTZ

Director, Air Force Office of Scientific Research (retired)

Former Director, Materials Science & Engineering Laboratory at the National Institute of Standards and Technology

Former Professor and Director of the Materials Research Center, Northwestern University

The Materials GatewaySM - www.mrs.org

JANIS

Cryogenic Wafer Probe Station



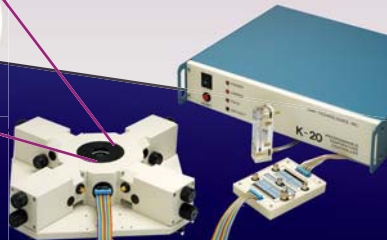
- DC to 60 GHz
- 3.2 K to 450 K
- Imaging with microscopes and cameras
- Two to six probe stations
- Cooling options: liquid helium, liquid nitrogen, or cryogen free

Janis Research Company

2 Jewel Drive Wilmington, MA 01887 USA
 TEL +1 978 657-8750 FAX +1 978 658-0349 sales@janis.com
 Visit our website at www.janis.com

Variable Temperature Microprobe Systems

- ◇ Highly Flexible, Configurable and Modular
- ◇ Automated Instrumentation
- ◇ Wide Temperature Ranges Available
 - ◇ 1 to 7 Manipulators
 - ◇ Helium Cryostat Option
 - ◇ Easy to Use
 - ◇ Reliable Results



MMR
 MMR Technologies, Inc

For more information, visit www.mmr.com