

A unique national project to increase the participation of women in science and engineering from Canada

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In 1996, an task force for the Natural Sciences and Engineering Research Council of Canada (NSERC) reported on 21 recommendations to increase the participation of women in research in the science and engineering fields. One of the recommendations resulted in the creation of five new regional chairs to build on previous work and multiply the efforts and visibility on this issue. In addition to working on the general issues of attraction and retention, the work engages in a closer analysis of the curriculum, structures, and conventions that mitigate against the full participation of many women, especially at the higher echelons of the organizations.

Each of these regional chairs will be assessed prior to termination of the first mandate -- in the year 2002 -- and renewal is possible for a second five-year term if the evaluation is satisfactory. Canada has created a unique opportunity to accelerate progress on the participation of women in the sciences and in the engineering profession. This program also addresses the shortage of human resources in certain areas, especially in the information technology sector -- where women's participation is so low. In our efforts, we will continue to work closely with the media to change societal perceptions of these careers. The results expected from this level of activity and co-operation is bound to have a profound impact and a successful outcome.

Approaches and perspectives in science and in engineering have come from a homogeneous group for far too long. Moreover, there is currently a critical shortage of skills in several of these fields and including more women is the most direct, practical, solution to this crisis. At this critical time, the number of women entering engineering and science may grow steadily if some fundamental changes are made to the culture and the education process. The profession and its leaders have a choice: Will the values, attributes, approaches, and ideas that women bring to the field be integrated into the culture? If R&D leaders begin to see how diversity will benefit the research community and our economies, then women will finally take their rightful place in the ranks. We will all be richer for it.

National Action Plan

1. Make available and share tools and resources that engage young women in preparatory science courses as well as science and engineering careers;
2. Develop a greater understanding of the factors that influence young women's career choices, especially as they relate to non-traditional fields within science and engineering;
3. Promote awareness to young women of careers in non-traditional areas within science and engineering and the contributions women are making in these field;
4. Develop sustainable strategies to increase the enrolment of women in undergraduate and graduate programs in fields with long term opportunities and demand;
5. Promote the hiring, promotion and retention of women in academic careers;
6. Develop strategies to attract, promote and retain women in science and engineering industry careers;
7. Promote a climate that results in a positive and supportive environment for women as students and in the workplace;

8. Increase the participation of women in leadership roles;
9. Disseminate information to decision-makers and the media to change societal perceptions of women participating in science and engineering careers.

Full details of the National Action Plan and the Mt. Tremblant paper are listed at <http://www.ensu.ucalgary.ca/cwse/cholders.html>

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