



*Dr. Leila Khoury*

## Women and Science at BUC



*Dr. Layla Nehme*

**Women to-day don't need to be encouraged to take science; they are doing it by their own choice.**

**One does not gain a knowledge of science merely by attending math and science courses. He or she gains it by developing a spirit of scientific curiosity, rational thinking, objectivity, truthfulness and readiness to acknowledge one's mistakes.**

A survey on women's rights conducted by the National Labour Women's Committee in Great Britain, 1980, revealed a general agreement on the necessity of encouraging girls to "go in for science and technology at all levels from birth to university".<sup>(1)</sup>

This "general agreement" induced us to contact two science professors at BUC in order to find out how women, who constitute half of the student body, are progressing in their study of science, what their motives are for choosing science as a major and what obstacles they are finding in their way. We also asked general questions about the math/science program at BUC, in order to provide a context for our findings.

First we talked with Dr. Leila Khoury, Associate Professor of Mathematics at BUC, and also chairperson of the Natural Science Division, who obtained her Ph.D. in Mathematics from Indiana University in 1966. In her office in Sage Hall, we conducted the following interview:

**Q. Why should women be encouraged to take science, and why is there a general demand that they should do so?**

**A. Women these days don't need to be encouraged to take science; they are doing so on their own and by their own choice. Times are changing; as more families can afford to send their children to college, they are encouraging both their sons and daughters to get an education. More and more women are being drawn to the study of science, and quite a large number of them are entering this field.**

**Q. Do our secondary schools give the students adequate preparation in science and mathematics? Are they provided with good laboratories?**

**A. One cannot generalize completely. However, the level of Mathematics in our Lebanese schools, is generally higher than that of science. There is a scarcity of laboratories and equipment in our schools. While this scarcity does not affect a theoretical field like math, it does hinder the quality of scientific education.**

**Q. Compared with colleges abroad, how would you evaluate the math/science program at BUC?**

**A. We do not have a math department or a math major at BUC, but we do have a good computer-math program within the Natural Science Division. We also offer a B.S. degree in Computer Science.**

**Our students are carefully screened from the very beginning. Through our guidance system, we usually can tell in their sophomore year whether they're fit for that major or not; if not, we advise them to change majors.**

**Q. What proportion of the students in science courses are female?**

**A. Roughly, an equal number of males and females attend our computer science classes, and they do equally well. Most of those who go abroad, including boys and girls, seem to excel in the best universities.**

**Q. How are the job opportunities for science/math majors?**

**A. Job opportunities are excellent for math-computer and computer science majors. Often they are employed even before they graduate as programmes and systems analysts. Opportunities for other science majors are also good. They may teach, or work in hospitals or industrial labs.**

**Q. How do you view the future of the math/science program at BUC?**

**A. Our aim at present is to enlarge our computer/math offerings and develop a Master's program. We may institute it as early as next year. People with degrees in computer science to-day are**

(1) Bulletin of "Socialist International Women" no. 5, 1981, London, England, pp. 59-67.

in great demand all over the world. We also hope to introduce a B.S. degree in Biology and a two-year program in Food Science and Nutrition.

From Dr. Khoury, we moved to Dr. Layla Ne'meh, Associate Professor of Physics at BUC. She earned a "Diplome d'Etudes Approfondies" in Mathematics from the Sorbonne, and a Ph.D. in Physics from Utah State University in 1975.

Dr. Ne'meh stated that it is difficult for Lebanese secondary school girl graduates to pursue a career in Science. She explained that because Science has not been a part of the traditional education of women here, families tend to discourage it.

She gave herself as an example, saying that only after a struggle could she convince her parents to allow her to pursue a major in a scientific discipline.

Dr. Ne'meh stressed that a knowledge of science entails more than a knowledge of the mathematics and scientific material. She offered the view that the spirit of scientific curiosity, keen observation, rational thinking, objectivity, truthfulness and readiness to acknowledge one's mistakes, should be cultivated in students from the earliest years and that this spirit should infuse not only science courses but courses in all disciplines. She stated her belief that the development of scientific thinking is the basis of true citizenship. She concluded from this belief that if our leaders and administrators were to be trained in this scientific spirit, they would then become more

honest in their dealings and more objective in their judgments.

About the Natural Science Division, Dr. Ne'meh gave the following information:

There are around 15 full-time and part-time professors, four of whom are females. Lab facilities are limited, due to budget cuts, but the computers are reasonably good. Because of budget problems and the situation in Lebanon, Professors are not able to do much research here. In order to engage in serious research, they must go abroad.

Dr. Ne'meh believes that the Natural Science Division should strive to keep good standards. It should also strive to serve the needs of our society by offering new areas of concentration. For example, one field that Lebanon needs is Science Education. Our schools lack good science educators. A B.S. in Chemistry or in Biology does not adequately prepare a person to be a science teacher; an emphasis on education is necessary.

Commenting on the government's ability to encourage scientific research, Dr. Ne'meh said:

"Yes the government can encourage research if it succeeds in cutting off unnecessary expenditures and in eliminating commercial private schools, the so-called "free schools" which extort government aid to realize illegal profits."

Finally, asked if she thinks a woman can be both homemaker and paid professional she said:

"Yes, she simply must be resourceful".

Interview by Nada Khoury