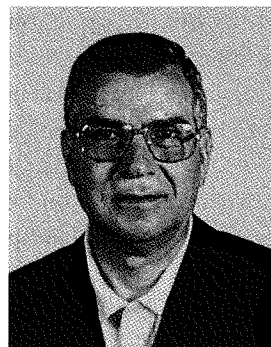


Has Chemistry a Future?

The Italian Chemical Society congratulates the Chemical Society of Japan for the 125th anniversary of her foundation and wishes for the forthcoming years successful and important achievements as for the period just concluded.

During the past decades there has been extensive exchange between the Japanese and Italian chemical communities which, in recent years, has ended up with an Agreement between the two Societies for the establishment of the Minakata-Avogadro lectureship. In the framework of this Agreement three scientists from each country have already been awarded. Recently, joint meetings on specialized topics have also been held in Japan and in Italy. We are also proud of hosting in our society honorary members from Japan.



Which future for Chemistry?

The birth of quantum mechanics and the deepening of knowledge on fundamental constituents of matter made W. Crookes to write, at the turn of the 20th century, as follows: "Chemistry will have a completely new basis. We won't need anymore lengthy and complicated experiments since we will be able to predict the results." As all of us know Chemistry didn't come to an end as foreseen by Crookes. Quantum mechanics, powered by computational methods, has simply enlarged the field of action of Chemistry. In any case even the aprioristic knowledge of the possible outcome of an experiment, *e.g.* the tailored design of a useful molecule, needs testing in a synthetic laboratory.

Similar to that put forward by Crookes was the question debated at the end of the 20th century (*Nature*, 406, 17 August 2000) "Is Chemistry a mature science or not?" The question has several important implications since it can result in basic research in Chemistry to be overshadowed by the continued growth in public support for other disciplines, such as biology, and not having a future of its own.

Probably the nowadays revolution is the marriage between all disciplines, but, as S. J. Lippard said, "Investing more in basic chemistry can advance other fields and help the language of science to evolve."

The improvement of mankind life will depend much on scientific and technological innovation affecting all fields of our everyday life: transport, houses, food, medicines and so forth. Chemistry is central to Science as it underpins many areas, including life sciences,

new materials and processes, biotechnology and agriculture, all of which require an understanding of the molecular world.

Our Society becomes increasingly reliant on the skill of chemists and chemical engineers to invest and produce new materials and to create new sustainable ways to make, use, and dispose them. Future scientists should be not only inventive and innovative, but also conscious of the society's needs for safety and protection of the environment.

The spreading of scientific knowledge and methodology among non-scientists is another important task, which we should deserve much attention to. International cooperation among Chemical Societies can help very much in: i) promoting research collaboration within and between academia and industry all over the world, ii) promoting the value of the chemical sciences, technologies and industry to the public, and iii) participating in governmental Research and Technology Development programs at an international level.

The spreading of innovation benefits is occasionally more a political than a scientific task, however, a common view of the Chemical Societies on important issues, such as the protection of the environment and the management of natural resources, is something that democratic expressed governments cannot, in the long range, disregard.

A handwritten signature in dark ink, appearing to read "Giovanni Natile". The signature is fluid and cursive, with a large loop at the end.

Giovanni NATILE

Professor, University of Bari

President of the Italian Chemical Society