## **DESORPTION '98**

## Mass Spectrometry of Large Organic Ions by Electrospray, Particle and Photon Induced Desorption

## Foreword

The interdisciplinary conference DESORPTION '98 took place in Angra dos Reis, on September 23-26 1998, bringing to Rio de Janeiro an impressive number of well known scientists interested on the ion desorption phenomenon. This event was a continuation of the IFOS symposia in Münster & Lövånger and the meetings held at Orsay, Wangerooge, Minaki Lodge, Burg Waldeck (DESORPTION '92), Sunriver Lodge and Resort (DESORPTION '94) and Bornholm (DESORPTION '96). The next meeting, Desorption 2000, will take place in Saint Malo, France. Over more than two decades, these meetings have brought together physicists, chemists, biochemists and other specialists with the common goal of better understanding desorption processes, allowing their application on Mass Spectrometry of large organic ions and developing the necessary instrumentation.

As the Desorption Conference was occurring for the first time in Latin America, the Organizing Committee agreed that it would be pertinent, just before the event, to offer tutorial courses to the growing Latin American desorption community. As a consequence, we had the privilege to have at the Pontificia Universidade Católica do Rio de Janeiro a series of lectures given by some of the pioneers and world leaders of this field: R. Macfarlane (Texas A&M Univ.), the discoverer of the biomolecule desorption by fission fragments and the inventor of PDMS (Plasma Desorption Mass Spectrometry), F. Hillenkamp (Münster Univ.) and M. Karas (Frankfurt Univ.), the inventors of MALDI (Matrix Assisted Laser Desorption Ionization), P. Håkansson (Uppsala Univ.), W. Ens (Manitoba Univ.), Y. Le Beyec (Institut de Physique Nucléaire, Orsay), P. Roepstorff (Odense Univ.), R. Johnson (Virginia Univ.), and D. Barofsky (Oregon State Univ.). Finally, A. Craievich (LNLS and São Paulo Univ.) gave a talk on Synchrotron Light for Surface Physics applications.

In 1898, Willy Wien (the 1911 Nobel Prize in Physics) performed the first analysis of ion beams (the "Canal Rays"), opening up the research on Mass Spectrometry. This outstanding discovery 100 years ago was commemorated during Desorption '98 through the invited talk of his relative and our colleague, Karl Wien (Darmstadt Univ.). The Wien's manuscript describing these centenary findings, as well as most of the tutorial notes are presented in this issue. All the lecturers are deeply acknowledged for preparing the didactical material.

Enio F. da Silveira Local Organizer