

## Preface

Sixteen years ago, the first international conference on lead-acid batteries LABAT'89 laid the foundations of a world community of scientists, technologists and experts working in the field of lead-acid batteries, who gather together every 3 years to discuss the latest achievements, problems and challenges facing the development of this most widely used electrochemical power source. These conferences of ours have become traditional and have withstood the fierce competition of numerous other meetings on power sources, which abound in the calendar of events lately. This year, the lack of international coordination resulted in a clash of three international conferences on electrochemical power sources held within the same week. The Organizing Committee of LABAT'2005 announces with great satisfaction that this year's conference was attended by nearly 200 battery experts from 30 countries. Sixty-two papers were submitted for presentation at the conference by speakers from all six continents. Twenty-one companies chose to exhibit their products and services at LABAT'2005.

Lectures were presented on the following major topics: VRLA batteries, battery models and impedance measurements, processes and problems related to the positive and negative plates, new and improved additives and separators, novel grid designs and technologies, innovative battery processes and monitoring and testing techniques and equipment. The presentations covered the whole spectrum of problems related to the science, technology, engineering and monitoring of lead-acid batteries. This is a clear indication that battery scientists and engineers have not lost their interest in one of the oldest battery chemistries, the lead-acid battery, even though it has been increasingly ignored lately in terms of funding by governmental and economical institutions. Generous subsidies have been granted to lithium ion cells and nickel/metal hydride batteries, as well as to fuel cells. The latter have met the needs of portable power sources with small capacity. However, the lead-acid battery remains the most widely used power source for automotive applications, information technologies, communication and computer centers, etc. The lead-acid battery is the only

cheap and reliable source of energy and power for the above everyday life applications. That is what keeps up the interest of scientists and technologists in this battery type, despite the total disregard of politicians and financial authorities.

Relying on limited local financial resources, scientists, engineers and technologists continue to develop fundamental knowledge about the technology of battery manufacture as well as about the processes during battery operation and propose novel engineering concepts. If we classify the lectures with regard to the nationality of their authors, geographically the papers come from all six continents: 31 papers from Europe, 19 from Asia, 6 from North America, 3 from Central and South America, 2 from Africa and 1 from Australia.

We can point out with satisfaction that new research centers have emerged on the world map. These are China, Iran and India. It is very encouraging to notice that our battery family is growing larger. After the small decline during the last years, the present conference has evidenced that the interest in this 145 years old power source is revived again. Let us hope that it will continue to grow and new technological and technical breakthroughs will be made in the near future.

Many of the exhibitors at LABAT'2005 shared with me that they have established useful business contacts and have had fruitful negotiations with potential clients. So, our conference is not only an important scientific event, but also an effective marketing forum.

On behalf of the organizers of LABAT'2005, I want to thank all who contributed to its success.

The next Seventh LABAT Conference will be held during the second week of June 2008.

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