

Foreword

Power Sources 16 is an edited record of the papers and posters submitted for presentation at the 20th International Power Sources Symposium, held at the Thistle Hotel, Brighton, UK from the 21st to the 23rd of April 1997.

The publication of these proceedings represents not only the work undertaken for the 20th Symposium but also marks nearly forty years of achievement for all those involved in the organisation of the event. The organisers have once again sought papers from all over the world in order to present current research and advances in battery and fuel cell technology.

The response was, as in 1995, overwhelming; however, in the three days available we accepted 42 papers for presentation (the largest number since the four-day Symposium in 1978). A restricted space for their display meant that only 30 posters could be accommodated.

The session on *Batteries for Medical Applications*, included The Bourner Lecture, which this year was given by Dr C.F. Holmes, Vice President of Wilson Greatbatch Ltd. (USA). Dr Holmes's lecture, entitled 'Electrochemical power sources — an important contributor to modern health care', highlights not only the application of the most advanced aspects of battery technology, including reliability, to the field of medicine, but also gives an indication of the burgeoning market for such products.

As in previous years, I should like to take this opportunity to thank all the authors who submitted papers and posters for publication. Their efforts have once again justified the existence of these Symposia.

Past attendees and recipients of previous proceedings cannot but have noticed the new format of the publication. It was not without some trepidation that the committee made the decision to move from what had become the traditional small-format size to the now more usual large-page style of this volume.

This has been achieved in conjunction with our new publishers, the prestigious Elsevier Science S.A. Association with this company means that, for the first time, authors will have their papers published in a special issue of *The Journal of Power Sources*.

To mark the 20th Symposium, this volume also contains an index of all papers and their authors presented at the various Symposia held since the first one in 1958. This major task, undertaken by our editor Austin Attewell, has brought to light some interesting statistics. For example, during these Symposia, over 775 papers have been published, representing the work of more than 1400 authors.

It will also be noted that there has been a change in the status of the organising committee. This was necessitated through the demise of the original sponsors who were the Joint Services Electrical Power Sources Committee of the UK Ministry of Defence. The new organisation, responsible for staging the Symposia, is now known as The International Power Sources Symposium Ltd. and is registered in the UK as a non-profit making educational charity. The management of this charitable company is undertaken by a Board of Trustees. This new structure will not only safeguard the future of the Symposium, but also its financial stability.

The variety and international nature of the work reported on by delegates from four continents emphasises the status of the conference as an important forum for academia and industry: an industry with an annual turnover estimated at 20 billion dollars.

I should like to take this opportunity to congratulate Dr Paul Skarstad, this year's recipient of the Booth Award, and to thank all those who contributed to the 1997 meeting. This includes my fellow trustees, also John Marshall of the Civil Aviation Authority (who served until Oct. 1996), and especially the professional officers who have worked with dedication to bring about this, the 20th International Power Sources Symposium.

T. Keily
Chairman of Trustees
December 1996