Batteries & Supercaps

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More Power in Series

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The past few years have been very exciting for the field of electrochemical energy storage. Batteries in particular have become an essential technology for achieving carbon neutrality as well as a key component of the next-generation transport and renewable energy solutions. It has been a real pleasure to witness the rapid growth of this research field and we are looking forward to the next scientific developments. In this Editorial, we will look back at what we accomplished in 2021 and we will share some of what's in store for 2022 and beyond. Without a doubt, working together with the scientific community has been the cornerstone for the development of the journal and we look forward to continue fostering these relationships.

An impactful year

In 2021, *Batteries & Supercaps* received its first Journal Impact Factor of 7.093 (2020 Journal Citation Report by Clarivate, released in June 2021). This was beyond our expectations and it would not have been possible without the exceptional support we have had from the very start from our Editorial Advisory Board as well as our authors, reviewers, and readers. We will work on this great foundation to continue to make *Batteries & Supercaps* the go-to journal for electrochemical energy storage research!

Virtual is the new reality: How we continue to connect with the community throughout the pandemic

Despite the continued effect of the COVID-19 pandemic, 2021 was a very fruitful year for our journal. We completed several Special Collections, including Beyond Lithium-Ion Batteries (joint with *ChemElectroChem* and guest-edited by Ivana Hasa, Philipp Adelhelm, Guozhong Cao, and Liqiang Mai), In Situ and Operando Methods for Electrochemical Energy Storage and Conversion (joint with *Chemistry—Methods* and guest-edited by Lorenzo Stievano and Vanessa Peterson), Hybrid Metal-Ion Supercapacitors (guest-edited by Teófilo Rojo, Guoxiu Wang, and Jim P. Zheng), and Artificial Intelligence in Electrochemical Energy Storage (guest-edited by Alejandro A. Franco and Amanda S. Barnard).

Without in-person conferences for networking and learning the latest developments in the field, we continued to host virtual events related to some of the above-mentioned Special Collections, which proved a wonderful way to interact with our authors and readers. Although these do not come close to the real experience, we were very pleased we could reach a wider audience through them. You can find the recordings of several virtual events from Chemistry Europe in the YouTube channel of ChemistryViews.

This year, we will continue to highlight the most current topics in electrochemical energy storage, and we will feature topical special collections on Lithium-Sulfur Batteries, Aqueous Electrolyte Batteries, Organic Batteries, and more! We will also organize a special collection dedicated to the conference Nordbatt 2022, which will take place in October. One topic that remains of utmost importance to us – and our audience – is open data and open science. Therefore, you can find a Special Collection across the Chemistry Europe portfolio dedicated to these topics, including some recent work published in *Batteries & Supercaps*.

Data reporting checklists: Helping authors standardize data reporting

The rate of scientific output and publication continues to accelerate, which makes it very challenging to keep up to speed with the latest developments and to be sure that

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reported results are based on data that has been recorded according to best practices in the field. While a good portion of the energy storage community has made calls for standardization of data reporting and sharing, the reliability of reported data continues to be a problem, as we still lack agreed-upon reporting standards.

We have been paying close attention to many discussions in the community, both in social media and through our participation in online events and conferences. Early in 2021, we took part in one of the Battery 2030+ workshops, in which we discussed the importance of data sharing policies and how data reporting standardization is necessary for achieving the FAIR data guiding principles. (FAIR data is digital data that is Findable, Accessible, Interoperable and Reusable.) In the framework of their BIG-MAP project, they have developed their own Data Management Plan, which should serve as valuable tool for guiding such a large collaborative project forward with reliable data. The Batteries Europe platform has also made big efforts into standardization for reporting of materials performance.

To make our contribution, starting this year, we are introducing data reporting checklists that are intended to capture key parameters of the described material/device according to best practices in one place. We will ask authors to submit their checklist along with the manuscript and they will be shared with the reviewers. This project is a joint effort among Wiley's Materials Science & Physics and Chemistry journals, and the first checklists for original Research Articles covering energy storage and efficiency and/or stability-related investigations of photovoltaic devices have already been piloted at *Advanced Energy Materials* last fall. *Batteries & Supercaps* is among the first of many journals who will join in this drive to make data reporting more transparent.

What can you expect? You can think of it as a summary page with easily accessible data. This will not substitute for reading the whole paper because the checklists are not intended to capture aspects of the study, such as its novelty. But they will make fundamentally important values harder to be missed by readers, reviewers and editors. The checklist can be found in our Author Guidelines, for an immediate look.

This checklist was developed together with recognized experts in their fields, and we are extremely grateful for the constructive discussion, in particular with our board members Volker Presser (INM Saarbrücken), Qiang Zhang (Tsinghua University), and Patrik Johansson (Chalmers University of Technology).

New board members: The community connection

The support from our Editorial Advisory Board has been vital for the success of our journal. This is a team of experts who provide strategic guidance and contribute to the development of the journal. After four years since our launch, we have been building relationships with the scientific community and we are delighted to announce the new members of our Editorial Advisory Board (Figure 1). Please join us in welcoming **Serena Cussen** (The University of Sheffield, UK), **Robert Dominko** (National Institute of Chemistry, Ljubljana, Slovenia), **Deepak Dubal** (Queensland University of Technology, Australia), **Li-Zhen Fan** (University of Science and Technology Beijing, China), **Patrik Johansson** (Chalmers University of Technology, Sweden), **Stefan Kaskel** (Technische Universität Dresden, Germany), **Vanessa K. Peterson** (Australian Centre for Neutron Scattering, Australian Nuclear Science and Technology Organisation, Australia), **Reza Shahbazian-Yassar** (University of Illinois at Chicago, USA), **Lorenzo Stievano** (Université de Montpellier, France), **Masayoshi Watanabe** (Yokohama National University, Japan), and **Zhen Zhou** (Zhengzhou University, China).

Batteries & Supercaps strongly believes that junior researchers are a fundamental part of the community and will help shape the future of science. Therefore, we are very excited to

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Figure 1. The new members of our Editorial Advisory Board.

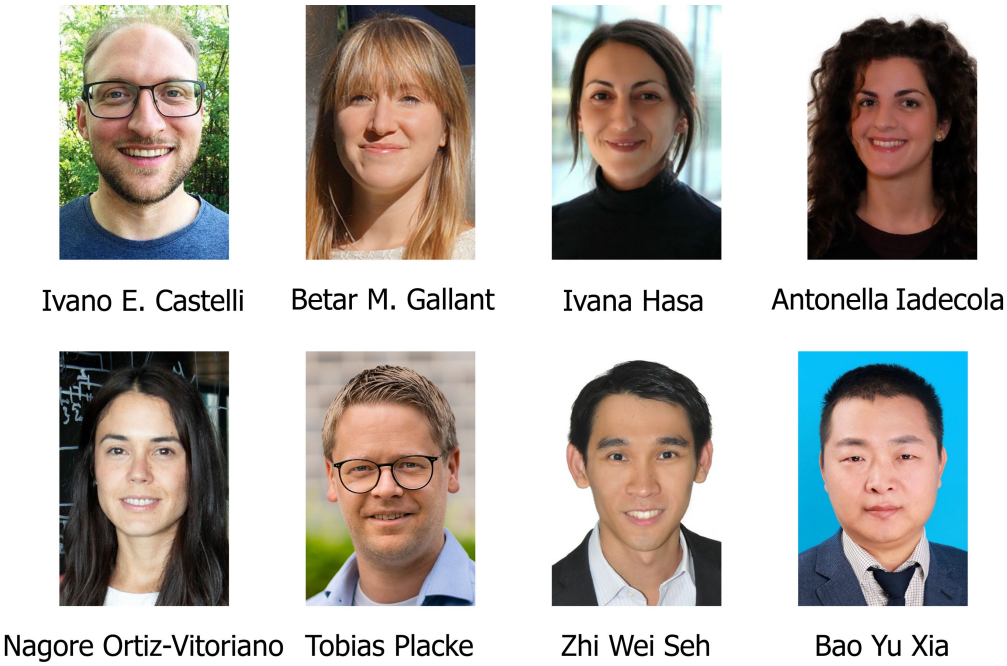

Figure 2. The members of our inaugural Early Career Advisory Board.

introduce this year our inaugural Early Career Advisory Board (ECAB), comprised of a new generation of energy storage scientists across the globe (Figure 2). We're delighted to welcome **Ivano E. Castelli** (Technical University of Denmark, Denmark), **Betar M. Gallant** (Massachusetts Institute of Technology, USA), **Ivana Hasa** (WMG – The University of Warwick), **Antonella Iadecola** (CNRS-RS2E, France), **Nagore Ortiz-Vitoriano** (CIC energiGUNE, Spain), **Tobias Placke** (MEET Battery Research Center, University of Münster, Germany), **Zhi Wei She** (Institute of Materials Research and Engineering, A*STAR, Singapore), and **Bao Yu Xia** (Huazhong University of Science and Technology, China) to our first ECAB.

We are very honored and excited to have these 19 researchers on board and we are looking forward to many fruitful collaborations! We are sure the relationship with both

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our Editorial and Early Career Advisory Boards will be crucial for the development of the journal. We would also like to take the opportunity to express our gratitude to the departing members of our Editorial Advisory Board.

Research article and eLocators

At Chemistry Europe and ACES journals, we constantly strive to find ways in which we can improve the author experience at our journals. With this in mind, in October last year we introduced an important change that makes the submission process simpler than ever. For manuscripts reporting the results of primary research, we have now only one article type—the Research Article. We combined the previous Full Paper and Communication into the new Research Article, giving our authors the flexibility and freedom to write their research how it needs to be written, submitting a research article to this journal which can be of any length. For more information on this and the other types of manuscript we publish, we encourage you to consult the journal Notice to Authors page.

In addition to this change, to help make it easier for readers and authors to cite articles immediately after publication, we will be using eLocators to identify articles for *Batteries & Supercaps* from January 2022. Instead of page numbers, manuscripts will be identified by a 10-character reference derived from the article's digital object identifier (DOI). For example, this editorial should be cited as "R. A. Rincón, G. Heydenrych, *Batteries Supercaps* **2022**, *5*, e202100371". eLocators serve the same purpose as page numbers in print media and are being more frequently used in the publishing industry as most research is published online. They have the advantage that your article is immediately citable in its final form upon acceptance, rather than having to wait for it to be assigned to an issue. We believe this is a positive step towards the digitization of science publishing, and that it will ultimately serve to make life easier for those who publish and read articles from the Chemistry Journal group. Please note this does not change the citation style for articles that have already been published in issues up to the end of 2021; these will still be cited with their assigned page numbers.

Stay in touch

Our journal continues to grow with the guidance of our Editorial Board and ECAB, but we are always open to any input from the members of the energy storage community. We encourage you to send us your feedback or ideas by contacting us through our journal email address (**batteries@Chemistry-Europe.org**) or through (**Twitter @Batt_Supercaps**). We'd be pleased to hear from you!

Wishing you all the best for 2022!

Rosalba and Greta