

Foreword Issue 61

We are pleased to present the Issue No. 61 of the Superconductivity News Forum which includes, first of all, the Highlight paper “Record-high Critical Current Density in Iron-based Superconducting Wires with Strong Vortex Pinning” by Dr. Yanwei Ma et al. and the announcement of the 2025 *Transactions for Applied Superconductivity* Distinguished Reviewers Awardees made by the Editor-in-Chief Dr. Min Zhang.

We include then 9 presentations from the **European Conference of Applied Superconductivity** (EUCAS 2025) celebrated in Porto (Portugal) in September 2025.

From the Materials category we have included the Plenary talk delivered by Dr. Anna Kario about materials for high-field magnets and 2 Invited talks delivered by Dr. Daniele Torsello et al. and Dr. Teresa Puig et al. The first one is related to the perspectives of understanding radiation damage of high temperature superconductors and the second one to the study of vortex pinning in the TLAG ultrafast growth process of coated conductors.

From the Electronics category we have included the Plenary talk delivered by Dr. Nobuyuki Yoshikawa covering the topic of a new era in superconducting digital electronics. Then we also include an Invited talk from Dr. Peter Hopkins et al. related to measurements of single flux quantum pulses.

Finally, we include 4 Invited talks from the Large Scale category. The first one was delivered by Dr. Stuart Wimbush about the magnets program of the Spherical Tokamak for Energy Production (STEP). The second one was given by Dr. Viktor Sytnikov about a 2,400 m long HTS cable line project. The third one was delivered by Dr. Jeremy Adams and it was related to testing the poloidal field magnets of the fusion facility SPARC. Finally, we include an Invited talk from Dr. Matteo Tropeano about 1 GW-scale MgB₂ power cables to be used in several facilities and projects.

We hope that you will find the content of the SNF Issue No. 61 informative and interesting. Remember to periodically check back to the site for continuous updates and announcements.

Xavier Obradors and the SNF Editorial Team