

Preface

The 29th International Toki Conference on Plasma and Fusion Research was organized by the National Institute for Fusion Science and held from October 27 to 30, 2020 at Ceratopia Toki in Toki City as a main venue connected online to prevent the COVID-19 infection spread. The International Toki Conference (ITC) is a topical meeting dedicated to a specific subject related to plasma and fusion science. The series began in 1989 with the founding of the National Institute for Fusion Science and has been held on an annual basis ever since. The conference topics cover a wide range of research in various plasma and fusion sciences.

In recent years, several new experiments have been started and construction of new devices are going forward around the world. Cooperation among experiments, theory, and simulations has become more important. Technological development, built on fundamental research topics, will be further utilized for applied plasma research and large-scale plasma science for fusion reactors. The conference topics cover a wide range of research in various plasma and fusion science. In addition, a special session on issues in the steady state operation of magnetically confined plasma was held. The topics selected for the 29th ITC were as follows:

- Magnetically Confined Plasmas
- Inertially Confined Plasmas
- Fusion Engineering and Reactor Design
- Basic Plasma Research and Plasma Application
- Fundamental Theory and Simulation Techniques
- Space and Astrophysical Plasmas
- Data Driven Plasma Science
- Special Session on “Steady State Operation of Magnetically Confined Plasmas”

This special issue of Plasma and Fusion Research (PFR) contains 61 regular articles which were presented at the conference. These papers have been accepted for publication after being peer-reviewed through the processes administrated by the editors listed below:

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Guest Editor-in-Chief
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