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Advances in Artificial Intelligence

Selected Papers from the Annual Conference of Japanese Society of Artificial Intelligence (JSAI 2020)

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Department of Social Informatics
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Kyoto, Japan

Eri Sato-Shimokawara
Department of Computer Science,
Graduate School of System Design
Tokyo Metropolitan University
Hino, Tokyo, Japan

Naohiro Matsumura
Graduate School of Economics
Osaka University
Toyonaka, Osaka, Japan

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Preface

This volume contains expanded versions of research papers presented at the international sessions of Annual Conference of the Japanese Society for Artificial Intelligence (JSAI), which was held online on June 2020. The JSAI annual conferences are considered key events for our organization, and the international sessions held at these conferences play a key role for the society in its efforts to share Japan's research on artificial intelligence with other countries. In recent years, AI research has proved of great interest to business people. The event draws both more and more presenters and attendees every year, including people of diverse backgrounds such as law and the social sciences, in additional to artificial intelligence. We are extremely pleased to publish this collection of papers as the research results of our international sessions.

The 2020 JSAI Annual Conference drew a record number of contributions, including 85 submissions for the international session, surpassing the number for the previous year. Contributors selected topics from the five categories of machine learning, human interface and education aid, knowledge engineering, agents, and robots and real worlds, with half of these pertaining to machine learning. The papers are selected for presentation at the international sessions over a period of two months, which at least two reviewers screen each paper. In the second phase of the review process, the chosen papers are once again evaluated for originality, significance, and quality. The final twenty-four are included in this book. All are original and high quality, and represent key contributions to AI research.

We would like to extend our deepest appreciation to President Itsuki Noda, Vice President Koji Morikawa (General Chair of JSAI2020), Ex-President Naohiko Uramoto, and Executive Committee Chair Akisato Kimura, as well as to the JSAI

administrative staff and Springer publishing staff for their tremendous assistance on this project. We would also like to thank the authors of the papers contained in this book and all international session contributors.

January 2021

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