



AI-Enabled Cognitive Radio Networks

Guest Editor:

Dr. Ferran Adelantado

Universitat Oberta de Catalunya
(UOC), Barcelona, Spain

Deadline for manuscript
submissions:

closed (15 November 2020)

Message from the Guest Editor

The unprecedented surge in data traffic experienced over the last decade has stretched the telecommunications wireless networks to their capacity, and, thus, making more efficient ways of spectrum utilization increasingly necessary. Recently, the integration of artificial intelligence (AI) technologies in communications networks has revolutionized how networks are managed. The adoption of AI promises self-adaptive and reconfigurable networks able to provide reliability, energy and spectrum efficiency, etc. AI is expected to be a cornerstone of future cognitive radio and spectrum sharing solutions.

This Special Issue targets novel research contributions on AI-Enabled Cognitive Radio Networks. Specific topics of interest include, but are not limited to the following:

- Challenges and issues in designing AI-enabled cognitive radio networks and communications
- Cross-layer design and optimization of AI-enabled cognitive radio networks
- Machine learning, deep learning or (Deep) reinforcement learning algorithms for spectrum access
- Traffic and/or interference prediction for spectrum sharing
- AI-based algorithms to improve wireless communications systems coexistence
- ...





sensors



an Open Access Journal by MDPI

Editor-in-Chief

Prof. Dr. Vittorio M. N. Passaro

Dipartimento di Ingegneria
Elettrica e dell'Informazione
(Department of Electrical and
Information Engineering),
Politecnico di Bari, Via Edoardo
Orabona n. 4, 70125 Bari, Italy

Message from the Editor-in-Chief

Sensors is a leading journal devoted to fast publication of the latest achievements of technological developments and scientific research in the huge area of physical, chemical and biochemical sensors, including remote sensing and sensor networks. Both experimental and theoretical papers are published, including all aspects of sensor design, technology, proof of concept and application. *Sensors* organizes Special Issues devoted to specific sensing areas and applications each year.

Author Benefits

Open Access : free for readers, with [article processing charges \(APC\)](#) paid by authors or their institutions.

High Visibility: indexed within [Scopus](#), [SCIE \(Web of Science\)](#), [PubMed](#), [MEDLINE](#), [PMC](#), [Ei Compendex](#), [Inspec](#), [Astrophysics Data System](#), and [other databases](#).

Journal Rank: JCR - Q2 (*Chemistry, Analytical*) / CiteScore - Q1 (Instrumentation)

Contact Us

Sensors Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland

Tel: +41 61 683 77 34
www.mdpi.com

mdpi.com/journal/sensors
sensors@mdpi.com
[X@Sensors_MDPI](#)