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CHAOS THEORY and APPLICATIONS

IN APPLIED SCIENCES AND ENGINEERING

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Special Issue on
Chaos Theory and Applications (Selected Extended Papers of EDIESCA 2022)
Dissemination and Research in the Study of
Complex Systems and their Applications (EDIESCA 2022)



One of the most important topics in science and engineering technology is the use of chaos. Fast growths in research on engineering applications and chaotic systems with integer and fractional orders have been reported in recent years. A diversity of innovative chaotic systems for usefulness in engineering applications have been proposed.

We welcome scholars to submit original papers to this Special Issue to highlight ongoing efforts to explain chaos-based engineering applications, such as complex networks, synchronization of complex systems, secure communication systems, artificial intelligence, machine learning, deep learning, optimization techniques, security for internet of things, embedded systems, and hardware implementation, among others.

The purpose of this Special Issue is to encourage original research articles in the field of chaos theory and their applications, including advances in the applied sciences and engineering that have practical applications with an emphasis on the experimental and theoretical. Both original research and review papers are encouraged.

Potential topics include but are not limited to the following:

- Complex networks
- Secure communication systems
- Communications and encryption
- Synchronization of complex systems and their applications
- Dynamics of lasers
- Wireless Optical Communications
- Bifurcations Analysis
- Dynamic systems in electronic circuits
- Security for Internet of Things (IoT)
- Dynamic systems and fractional calculus
- Chaos and non-linearity
- Embedded systems and hardware implementation
- Artificial Intelligence
- Machine Learning and Deep Learning applied in Complex Systems
- Optimization techniques
- Robotics and control
- Multi-stability and coexistence of attractors

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Authors can submit their manuscripts through the Manuscript Tracking System at
<https://dergipark.org.tr/en/pub/chaos/writing-rules>

This Special Issue will include selected extended papers presented at [EDIESCA 2022](#).