

Suitability Summary for Best Researcher Award

Dr. Bahadır Kopçasız, a distinguished academic and researcher at İstanbul Gelişim University, is a leading figure in applied mathematics, particularly in nonlinear dynamics, optical solitons, and fractional-order equations. With a robust academic background, including a Ph.D. from Bursa Uludağ University, Dr. Kopçasız has consistently demonstrated exceptional research capabilities, making him an ideal candidate for the prestigious **Best Researcher Award**. His contributions have not only advanced the field of mathematical physics but also set a benchmark for innovation and scholarly excellence.

Key Contributions

1. Publications in Prestigious Journals:

Dr. Kopçasız has authored numerous high-impact articles in internationally recognized journals, such as *Nonlinear Dynamics* (Q1), *Journal of Ocean Engineering and Science* (Q1), and *Optical and Quantum Electronics* (Q2). His work often focuses on exploring novel soliton solutions, bifurcation analysis, and chaotic behaviors in nonlinear equations.

2. Research Impact and Innovation:

- Developed groundbreaking solutions for the fractional-order dual-mode nonlinear Schrödinger equation.
- Provided a detailed qualitative analysis of (2+1)-dimensional complex modified Korteweg-de Vries systems, enriching the understanding of optical soliton dynamics.
- Innovated methods for solving nonlinear equations, including Lie symmetry analysis, Caputo residual power series, and μ -symmetry approaches.

3. Ongoing and Under-Review Contributions:

Dr. Kopçasız's current submissions and revisions in top-tier journals such as *Nonlinear Dynamics* and *Scientific Reports* underscore his ongoing commitment to advancing scientific inquiry. Notable under-review works include soliton solutions for the Kaup-Newell model and the generalized Kadomtsev-Petviashvili equation, showcasing his ability to address complex mathematical challenges with innovative methodologies.

4. Conference Contributions:

His active participation in international conferences, such as the *1st International Conference on Engineering and Applied Natural Sciences* (Konya, 2022) and the *International Conference on Multidisciplinary Sciences and Technological Developments* (Erzurum, 2024), highlights his dedication to disseminating knowledge and fostering collaborative research.

Conclusion

Dr. Bahadır Kopçasız exemplifies the qualities of a world-class researcher through his prolific output, innovative methodologies, and impactful contributions to applied mathematics and nonlinear dynamics. His work bridges theoretical advancements with real-world applications, solidifying his reputation as a leader in his field. Receiving the **Best Researcher Award** would be a fitting recognition of his relentless pursuit of excellence, inspiring future generations of scholars.