Application of Fractional-Order Calculus of Complex Orders in Science and Engineering

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Fractional-order Calculus have gained great momentum in the last two decades. It had been applied in many fields of science and engineering and proved its flexibility and broad features in system modelling, analysis and control. The proposed session will further broaden up the application of fractional-order calculus to include complex orders. This Open Track Session is entitled "Application of Fractional-Order Calculus of Complex Orders in Science and Engineering" at the upcoming ICFDA'24 conference. This is a unique opportunity to share your insights, present cutting-edge research, and engage in meaningful discussions within the dynamic field of fractional-order calculus of complex orders.

This Open Track Session aims to bring together researchers, academics, and professionals interested in exploring the diverse applications of fractional-order calculus of complex orders and their applications in science and engineering. We welcome contributions that span various disciplines, including but not limited to mathematics, physics, engineering, biology, chemistry and finance.

This special session aims to provide new pathways to broaden application of fractional-order calculus to complex-order ones. The following is a list of topics of interest (but not limited to) for this track:

- Novel Applications of Fractional-Order Calculus of complex orders

- Control Systems and Fractional Dynamics of Complex Orders.

- Signal Processing and Fractional Calculus of Complex Orders.

- Fractional-Order Models of Complex Orders in Engineering

- Biomedical Applications of Fractional Calculus of Complex Orders.

- Application of Fractional Order Calculus of Complex Orders in Chemistry and Chemical Engineering

- Fractional Calculus of Complex Orders in Financial Mathematics

- Numerical Methods and Simulation Techniques of Fractional-Order Differential Equations and Partial Differential Equations of Complex Orders.