

On a new class of Atangana-Baleanu fractional Volterra-Fredholm Integro-differential inclusions with non-instantaneous impulses

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Abstract

This manuscript's main objective is to examine the existence of piecewise-continuous mild solution of Atangana-Baleanu fractional Volterra-Fredholm integro-differential inclusions (ABVFIDI) with non-instantaneous impulses (NII) in Banach space. Based on Martelli's fixed point theorem and p -resolvent operators, we develop the main results. An example is given to support the validation of the theoretical results achieved.