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LEONARDO DA VINCI DID NOT DISCOVER THE TIME SQUARE LAW BEFORE GALILEO GALILEI

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The present paper analyzes Leonardo da Vinci's studies on the motion of falling bodies, especially one of them in the Codex Arundel. According to Leonardo, bodies fall according to the relationship: "d proportional to $(t + t^2)/2$ ". More recent studies mention that Leonardo da Vinci developed a geometry that leads to a gravity acceleration value close to 9.8 m/s^2 , according Gharid, et al (2023). However, geometric calculations based on Leonardo's observations demonstrate that his theory results in a less accelerated fall, with a value lower (a half) than the currently accepted one.

Education level

All ages

Physics topic

Interdisciplinary topics

Research focus

Active learning

Research method

Mixed method (qualitative & quantitative)

Organizing preference criteria

Physics topic

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