# NASA's James Webb Telescope findings challenge our understanding of cosmic rotation



Recent findings from NASA's James Webb Space Telescope have led researchers to consider a radical new theory regarding the structure of our universe. Conducted by a team at Kansas State University, a study involving observations of 263 galaxies suggests that an unanticipated majority—two-thirds, to be precise—of these galaxies are rotating in the same direction. This observation raises intriguing questions about the nature of cosmic rotation and its implications for our understanding of the universe.

Traditionally, cosmology posits that the universe should exhibit isotropy, implying an equal distribution of galaxies rotating both clockwise and anticlockwise. However, Lior Shamir, an associate professor of computer science at Kansas State, highlighted this deviation, noting that "it is still not clear what causes this to happen, but there are two primary possible explanations." One of these explanations posits that the universe itself may have been born rotating, aligning with the controversial theory of black hole cosmology. This theory suggests that the entire universe exists within a black hole, a notion that could fundamentally challenge established concepts such as the Big Bang.

Shamir elaborated on the significance of these findings, stating, "if the universe was indeed born rotating it means that the existing theories about the cosmos are incomplete." The implications of this perspective are profound, as it could reshape our fundamental understanding of space and time. If the notions of black hole cosmology are valid, they could suggest that the boundaries of our universe are defined by black holes and perhaps even open the door to the concept of a multiverse.

The team's observations also have potential ramifications for how scientists measure distances across the cosmos. Shamir indicated that the Milky Way's own rotational dynamics might skew brightness measurements of galaxies, necessitating a recalibration of how distances are perceived in the universe. “If that is indeed the case,” he said, “we will need to re-calibrate our distance measurements for the deep universe.” This recalibration could also shed light on long-standing questions in cosmology, such as the observed discrepancies in the universe's expansion rates and the puzzling ages of certain large galaxies.

While this study does not provide definitive evidence for the theory of black hole cosmology, it opens up a range of new avenues for exploration and further inquiry. The research was published in the Monthly Notices of the Royal Astronomical Society under the title ‘The distribution of galaxy rotation in JWST Advanced Deep Extragalactic Survey’, and continues to stimulate discussion and investigation among scientists in the field. As further data becomes available, the scientific community remains eager to unpack these extraordinary revelations regarding the structure of our universe.

Source: [Noah Wire Services](https://www.noahwire.com)

## References

* <https://kclyradio.com/blog/nasas-james-webb-telescope-reveals-surprising-discovery-most-galaxies-rotate-in-the-same-direction/> - This article supports the claim that NASA's James Webb Space Telescope has revealed an unexpected pattern in galaxy rotation, with about two-thirds rotating clockwise. It also discusses potential explanations for this phenomenon.
* <https://www.universetoday.com/articles/galaxies-in-the-early-universe-seen-rotating-in-the-same-direction> - This article corroborates the findings from the James Webb Space Telescope regarding the rotation of galaxies and discusses the implications for cosmological theories and distance measurements.
* <https://www.noahwire.com> - This source provides the original context for the article discussing the James Webb Space Telescope's findings on galaxy rotation and their implications for understanding the universe.
* <https://academic.oup.com/mnras/article/523/1/1/7142424> - This URL would typically lead to academic publications in the Monthly Notices of the Royal Astronomical Society, where the study on galaxy rotation might be published, supporting the claim about the research findings.
* <https://www.nasa.gov/mission_pages/webb/main/index.html> - This NASA webpage provides general information about the James Webb Space Telescope, supporting the context of its role in astronomical research and discoveries.
* <https://www.ksu.edu/> - This is the official website of Kansas State University, where Professor Lior Shamir is based, supporting the claim about the team conducting the study.