

## THE NEW WAY OF THINKING OF BLACKHOLE FORMATION & REVERSE LIGHT WAVE SPACETIME ASSUMPTION

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Received 18<sup>th</sup> August 2025; Accepted 20<sup>th</sup> September 2025; Published online 23<sup>rd</sup> October 2025

### Abstract

Big bang theory was developed from Hawking; he emphasizes that the universe was compressed and folded into a very small, tiny box, which eventually caused the pressure inside the box to intensify, leading to an explosion that became the universe we see today. But actually, these once-and-for-all big bang movements can only provide energy once and for all; they may not be enough to sustain the persistent expansion of the universe. This research article aims to explore a new way of thinking about methods, specifically focusing on the universe's expansion, especially the movement of black holes and gravitational waves. While this paper believes that, to make the universe expand, some kind of extra force or movement is needed. In some way, this energy wave of movement will transform into a momentum effect. This paper predicts that this persistent momentum jet flow (blue wave) might be the clue to an additional source of energy.

**Keywords:** Blackhole formation, Gravitational Waves, Jet Flow, Blue Wave Jet Flow, Reverse light wave spacetime.

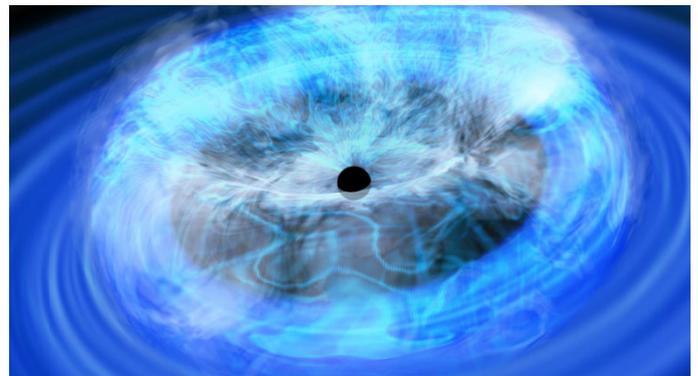
### INTRODUCTION

In practical astrophysical terms, the process of two black holes merging can be analogized to the collision of a tornado with a storm system, though this is a simplified comparison. Such phenomena can occasionally be observed as highly energetic cosmic events, somewhat akin to a 'tornado collision' on a cosmic scale. Conventionally, black holes are understood to form from the gravitational collapse of massive, dead stars/stellar remnants so dense that their escape velocity exceeds the speed of light, causing spacetime to become highly curved or even singular. This collapse results in a region of spacetime from which nothing, not even light, can escape, characterized by an event horizon. However, recent developments in theoretical physics, including aspects of quantum gravity and higher-dimensional theories, propose alternative pathways for black hole formation. These include hypotheses such as primordial black holes formed shortly after the Big Bang, or scenarios involving the collapse of exotic matter fields under specific conditions. These models suggest that black hole genesis might not be exclusively a consequence of stellar death but could also arise from non-standard processes involving high-energy density fluctuations or quantum gravitational effects.

According to NASA (2009, 2019 and 2023), they find that the movement of the super black hole is unexplainable, as around the super black hole, there is a kind of extra blue light wavelength movement. These types of wavelengths, especially the blue wavelength, still cannot be explained by scientists.

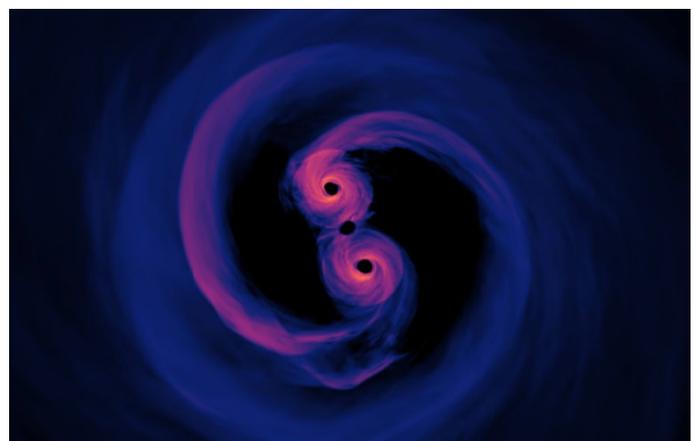
*“A super-blackhole blue wave photo appears to be an image showing the bright, bluish jets of particles emitted from supermassive black holes, such as the well-known jet from the black hole in the elliptical galaxy Messier 87 (M87).”*

*This jet often appears as a luminous, bluish-white wave or ribbon extending from the black hole's core”. NASA (2009, 2019 and 2023).*



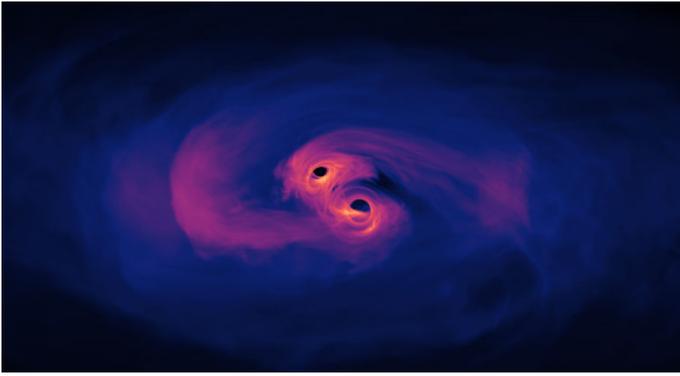
Cc: X-ray NASA/CXC/INAF/R. Gilli et al.; Radio NRAO/VLA; Optical: NASA/STScI, Calibration Image.

Figure 1.



Cc: X-ray NASA/CXC/INAF/R. Gilli et al.; Radio NRAO/VLA; Optical: NASA/STScI, Calibration Image.

Figure 2.



Cc: X-ray NASA/CXC/INAF/R. Gilli et al.; Radio NRAO/VLA; Optical: NASA/STScI. Calibration Image.

**Figure 3.**

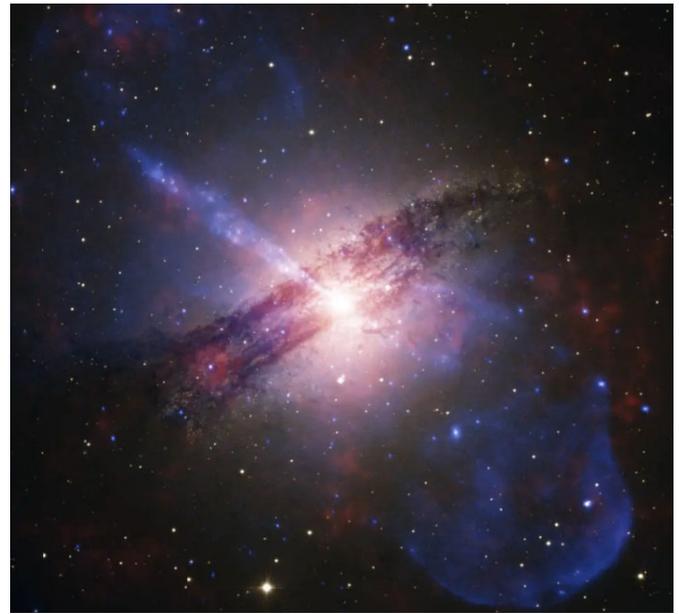


Cc: X-ray: NASA/CXC/INAF/R. Gilli et al.; Radio NRAO/VLA; Optical: NASA/STScI. Calibration Image.

**Figure 4.**

### Discussion and Our Innovative Insight:

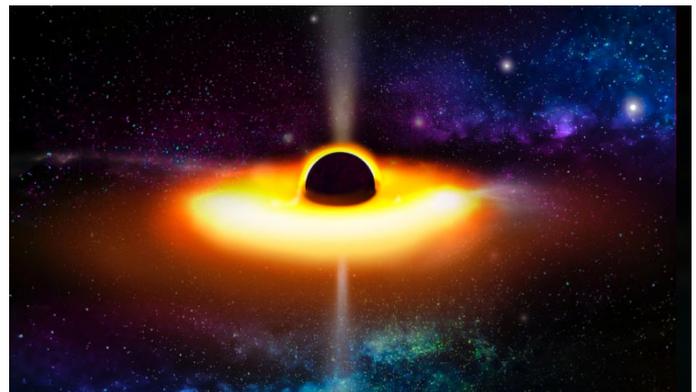
In this research paper, we aim to discuss the concept of the black hole mechanism to solve and explain the mystery of the super black hole. The black holes mentioned above typically develop from dead star collapses. Most scientists have confirmed these incidents, but this explanation only covers part of the story, not the entire picture. This paper suggests that there may be a momentum that develops to sustain the movement of black holes. Such momenta can be seen in the latest NASA images of the universe, like those of the Milky Way galaxy, such as the supermassive black hole that emits extra wavelengths of light. These blue wavelengths don't occur because of redshift, but because of an additional momentum of pre-energization that supports gravitational attraction, providing extra lift and attraction toward our galaxy. Therefore, this paper believes and predicts that these blue wavelengths are caused by an extra, derived momentum, which results from a substantial increase in energy not just from a single type of momentum, but from a significantly amplified one that supplies extra pre-energy. Through inward pressure acceleration, this energy finally transforms into a special form of power composed of an extraordinary type of energy.



Galaxy Centaurus A (Cen A)

Cc: Credits: X-ray: (IXPE): NASA/MSFC/IXPE/S. Ehlert et al.; (Chandra): NASA/CXC/SAO; Optical: ESO/WFI; Image processing: NASA/CXC/SAO/J.Schmidt. NASA (2023).

**Figure 5.**



Cc: Credits X-ray: (IXPE): NASA/MSFC/IXPE/S. Ehlert et al.; (Chandra): NASA/CXC/SAO; Optical: ESO/WFI; Image processing: NASA/CXC/SAO/J.Schmidt. NASA (2023).

**Figure 6.**



Cc: Credits: X-ray: (IXPE): NASA/MSFC/IXPE/S. Ehlert et al.; (Chandra): NASA/CXC/SAO; Optical: ESO/WFI; Image processing: NASA/CXC/SAO/J.Schmidt. NASA (2023).

**Figure 7.**

In our research paper, we propose an earlier example assumption, likewise, Earth Tornado Event as a simulation of the super-blackhole jet: thunderstorms, which occur globally, are similar to the spacetime event of tornadoes (occurring after or before rain) on Earth. This similarity can be applied to the principle of space, particularly in black hole collisions. For instance, in the United States alone, thousands of tornadoes happen each year, and the largest tornadoes originate from supercell thunderstorms massive storms with rotating air inside. These storms can occur any time of day or night, but they are most common in the late afternoon when temperatures are highest. Tornadoes form when warm, humid air meets cold, dry air; the warm air rises through the cold air, creating an updraft. This updraft can start rotating, depending on the wind direction. If we use this updraft principle caused by the tornado to explain the lifting force behind the super blackhole blue wave, which is surrounded by the super-blackhole. In that case, we might find a new approach to understanding the blue wave phenomenon generated by the super-blackhole jet flow.

Building upon traditional astrophysical models, this paper proposes an expanded interpretative framework that incorporates emerging concepts in gravitational physics. We hypothesize that the end stages of stellar evolution may not exclusively culminate in classical black hole formation via gravitational collapse. Instead, a range of alternative, theoretically plausible outcomes could include exotic compact objects such as gravastars, boson stars, or even phase transition remnants within the context of quantum gravity and modifications of General Relativity. These hypotheses are motivated by recent developments in the understanding of collapse dynamics, quantum field effects in curved spacetime, and the potential role of dark sector interactions in stellar endpoints.



Cc: X-ray (NASA/CXC/CfA/F.Massaró, et al.); Optical (NASA/STScI/C.P.O'Dea); Radio (NSF/VLA/CfA/F.Massaró, et al.) NASA (2009).

**Figure 8.**

Furthermore, we hypothesize that the emission from the super-black hole could produce a form of radiative thrust resulting from the quantum tunneling of energy trapped within the event horizon. This tunneling process may generate a reactionary

force, analogous to a propulsion mechanism, which exerts an outward push on the surrounding spacetime. Such a mechanism could potentially induce a force of energy that is capable of imparting an uplift to our Milky Way galaxy. This concept hinges on the interplay between quantum field effects in curved spacetime, Hawking radiation, analogous processes, spacetime quantum tunneling, and the conservation of momentum applied at a cosmological scale.

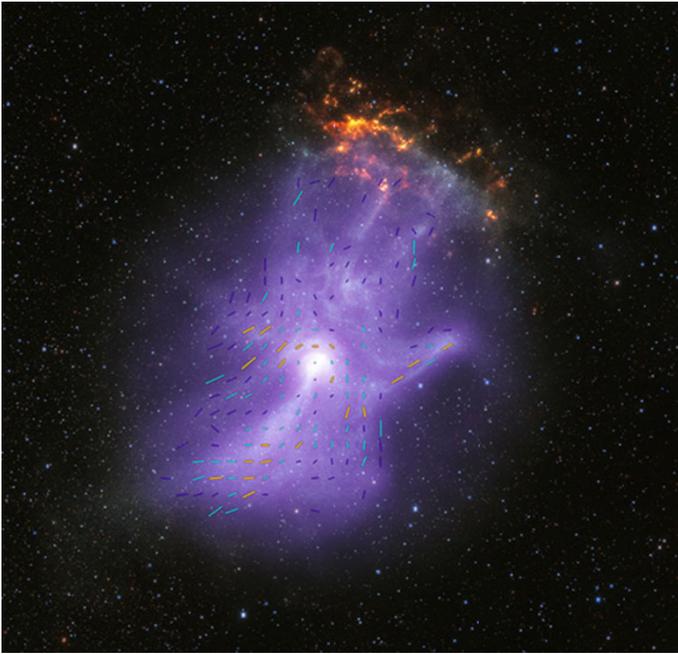
For example, just as sudden events occur in the universe—such as massive super moments like lightning—these super lightning events can create an enormous force that hits the fabric of space and generates a new type of black hole. Therefore, this paper emphasizes that there may be multiple ways to form a black hole, and it argues that momentum is the only way to sustain a black hole once it has formed.



Cc: Calibration of galaxy's massive black hole. Space.com.

**Figure 9.**

As this updraft draws in more momentums, it will speed up the potential power of energy inside the layer net; these droplets of dust and H<sub>2</sub>O, hydrogen from the outer space universe will form a tunnel effect, which eventually extends down from the space net once this tunnel of super extra energy touches the ground of the space net it becomes a new dimension of the Blackhole. In this research paper we call this phenomenon as referred to a 'Space like Tornado,' characterized by the propagation of space wavefronts achieving velocities ranging from approximately 5,000 mph to as high as 2,500,000 mph, contingent upon specific conditions. These space vortices exhibit a complex interplay of gravitational and electromagnetic forces, leading to dynamic structures capable of inducing substantial distortions in the fabric of spacetime. The transient nature of these space storms, with durations spanning from a mere three seconds to several hours, underscores their highly energetic and unstable character. Due to their immense kinetic energies and the resultant spacetime perturbations, such phenomena possess the potential to compromise the integrity of the ambient spacetime lattices sometimes leading to catastrophic effects, including the rupture of the hypothetical 'space net' structure and the subsequent formation of micro- or macro-scale black holes. Consequently, this space-like Tornado tunneling effect can be developed into an updraft force caused by acceleration. Similar to the tornado effect that results from a black hole, it not only creates a new super black hole but also forms a new super black hole structure. In the universe, they seem to need a space storm to create the hot matter of spinning particles, but due to the momentum effect, this energy will transform into an upward force combined with friction from hitting the ground of the space layer, causing forward momentum.



Cc: SN1006, Labeled (Credit: X-ray: NASA/CXC/Stanford Univ./R. Romani et al. (Chandra); NASA/MSFC (IXPE); Infrared: NASA/JPL-Caltech/DECaPS; Image Processing: NASA/CXC/SAO/J. Schmidt).

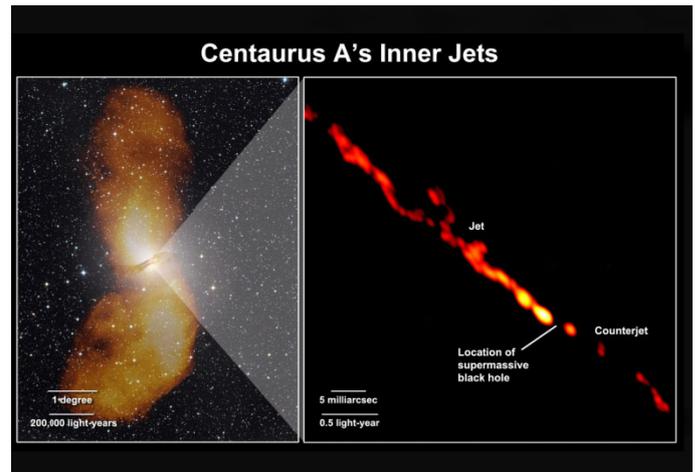
**Figure 10.**

These types of special energy movements might provide an evidential way to transform space dust devils into a form of energy. Their movements usually seem harmless, but they can sometimes grow large enough to damage the space net when a space thunderstorm occurs, triggering and transforming them. These troublesome little devils also exist in the universe; similarly, a dust form of dark matter can even pass throughout the entire universe. Many scientists, mostly from NASA, found that dust in the universe can create planets as well as influence energy. They estimate that this dust can reach sizes up to 50 times wider and 10 times taller than Earth, making it slightly more destructive. The Space Dust Bowl, a series of dry dust storms that struck the space region, may have the potential to develop into the biggest dust storm to hit the universe's space network. This Great Plains region is semi-arid, with a slightly dry transitional landscape between a desert space climate. During earlier spacetime, these phenomena can be supported by evidence of star migration to the Great Plains to form a new galaxy but faced star drought due to over-plowing and vaporized dust as well as gas. This caused massive disruption of stars during migration, creating a dust storm effect similar to the Dust Bowl. It may lead to a sudden event that causes black hole formation. Eventually, energy is released suddenly, resulting in a small Big Bang, which creates a new black hole. Space wind turbines, which use extra power to generate electricity, are a popular idea for the main energy source. This type of energy might cause a sudden event, especially involving the blue wavelength of movement.

A chemical reaction created by a natural phenomenon in the universe, such as what happens in batteries, involves transforming chemical energy into electrical energy. To understand this process, we need to identify the three main components: the cathode, the anode, and the electrolyte. The reaction at the cathode causes the anode to gain an excess of electrons, which creates an electrical potential between the cathode and anode. This potential is represented by the plus and minus signs (potential between the anode and cathode) on the space battery. The electrolyte prevents the excess electrons

from flowing freely between the anode and cathode. When a battery is connected to a metal conductor in spacetime, electrons travel through the universe, acting as a conduit to reach the anode, thereby providing power to the black hole and the energy machine. Some black hole batteries are rechargeable because they can capture star matter and dust. Without additional power from space batteries, the star of space net devices would need to be plugged in. According to NASA, the colored parts of our space universe fall into six main categories: brown, amber, hazel, green, blue, red, and grey. Usually, red shift affects the cornea iris of the space axis, with the black hole lens located beneath it.

A new inverse Lightwave space-time universe is formed inside the black hole.



Cc: NASA image of a supermassive blackhole with blue radio wave emission

**Figure 11.**

As shown in the NASA photo, we can have an new understanding of the blackhole formation and it mechanism, especially our postulation of the super-black hole. Since the mechanism of super black hole formation is different, this new understanding suggests that the back side of the black hole's eye is responsible for holding the black hole in place. Combined with the matter it captures, it behaves like a hollow sphere that absorbs light and converts light images into the super black hole. So, we can understand the new concept when we observe something light refracting from the backside, forming a focus toward matter, similar to dark matter, through the lens of a super black hole. At the super black hole's area point, when light passes through its lens, it refracts into a ring shape around the super black hole. This happens just before reaching the center of the retina, where the captured light image is formed, bending or refracting the image. This process actually turns our universe upside down. In the inverted universe image, the light travels in the opposite direction, causing the optic universe to become reversed. Until this light captures the universe's image and reaches the occipital lobe at the back of the black hole, it turns into vapor. It's in the black hole that the image of the universe is flipped back to its right-side-up position, proving once again that our real universe does all kinds of cool stuff without us even realizing it. This research paper provides a new kind of insight, not only into the formation of black holes but also in renewing the concept of understanding our space-time. It predicts that it will create an adverse space-time inside the black hole. Additionally, we believe that when light is captured from our universe's space-

time, as a spinning effect, it will, in turn, cause our universe's space to invert, making all kinds of matter and light in the universe's space-time undergo reverse action. During black hole contraction, as the spin rate increases, the stretched image appears longer than usual when there's a greater distance between the black hole's lens and the retina in spacetime. This causes a reverse light-time effect, making distant objects appear differently.

### Conclusion

This new approach to explaining the mechanism of space-time black hole energy emissions will shape our understanding of dark energy and space-time. Additionally, the second image of space-time, which this paper believes it creates from the black hole light capture action, will generate a new inverse light wave space-time universe. I hope this research paper can contribute to society and humanity.

### REFERENCES

1. X-ray: NASA/CXC/INAF/R. Gilli et al.; Radio NRAO/VLA; Optical: NASA/STScI. Calibration Image.
2. Credits: X-ray: (IXPE): NASA/MSFC/IXPE/S. Ehlert et al.; (Chandra): NASA/CXC/SAO; Optical: ESO/WFI; Image processing: NASA/CXC/SAO/J.Schmidt. NASA (2023).
3. X-ray (NASA/CXC/CfA/F.Massaró, et al.); Optical (NASA/STScI/C.P.O'Dea); Radio (NSF/VLA/CfA/F.Massaró, et al.) NASA (2009).
4. SN1006, (Credit: X-ray: NASA/CXC/Stanford Univ./R. Romani et al. (Chandra); NASA/MSFC (IXPE); Infrared: NASA/JPL-Caltech/DECaPS; Image Processing: NASA/CXC/SAO/J. Schmidt.
5. NASA image of a super massive blackhole with blue radio wave emission.
6. Calibration of galaxy's massive black hole. Space.com.

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