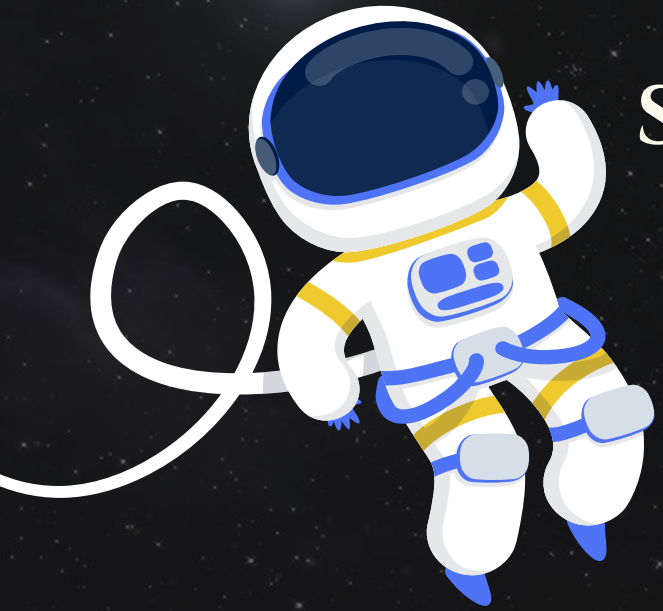
Optical Odyssey



So what do you Think ,Why there is necessity to put telescope in space?

INTRODUCTION

The universe is vast and mysterious, and it has always been a subject of fascination for humans. We have been exploring the cosmos for centuries, but there is still so much we do not know.

One of the most important tools in our quest to understand the universe is the telescope. The telescope has allowed us to see further and more clearly than ever before, and it has revolutionized our understanding of the cosmos.

Limitations of ground based telescope

Ground-based telescopes have been instrumental in advancing our knowledge of the universe, but they have their limitations. One of the biggest limitations is atmospheric distortion.

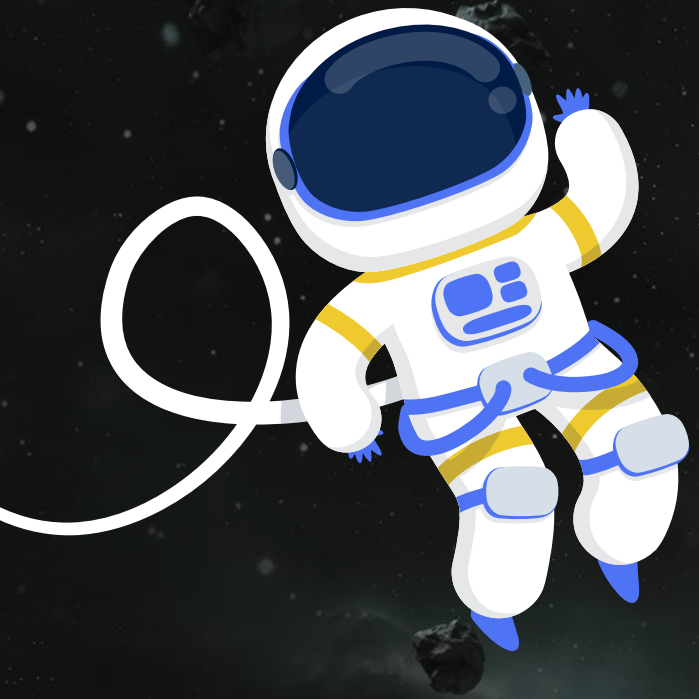
The Earth's atmosphere causes light to bend and scatter, which can distort the images captured by ground-based telescopes. This distortion can make it difficult to study objects that are far away or faint.

ADVANTAGES OF SPACE TELESCOPE

Putting telescopes into space eliminates the problem of atmospheric distortion. In the vacuum of space, light travels straight and true, allowing for clear and sharp images of even the faintest objects.

Space telescopes also have the advantage of being able to observe in wavelengths that are blocked by the Earth's atmosphere, such as ultraviolet and infrared light. This allows us to study objects and phenomena that would be impossible to observe from the ground.

1. No light Pollution
2. No night-time only limit
3. Better resolution
4. Greater wavelength spectrum
5. No bad weather

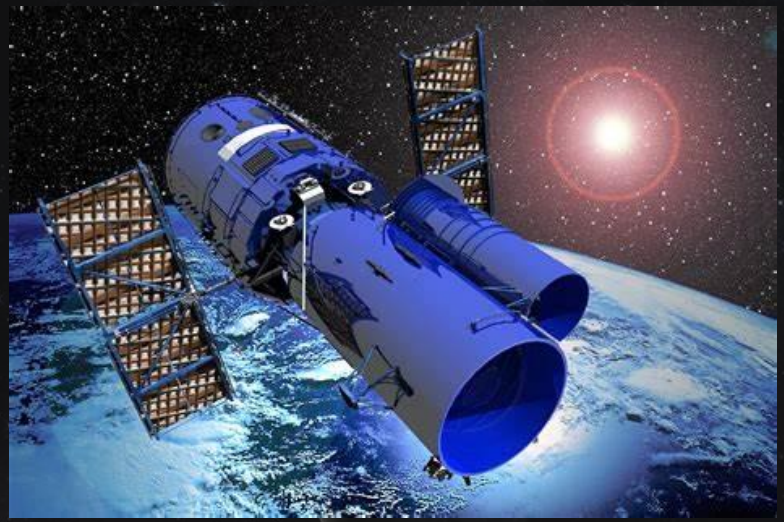


OK ...THEN DO YOU KNOW WHICH IS THE FIRST SPACE TELESCOPE?

Orbiting Astronomical Observatory 2

HUBBLE SPACE TELESCOPE

Hubble has provided astronomers with more than a million astronomical observations, which have overturned many of our ideas about where the Universe came from and where it is going. Among other things, the Hubble Telescope measured the size of the Universe, provided the first evidence of "dark matter" and "dark energy," and observed the Universe to be expanding much faster than previously thought.



If the Hubble Telescope has been so successful, why do we want to build, launch, and operate the Webb Telescope?

What advantage does the Hubble Space Telescope have over ground-based telescopes?


THANKS !!