# 1 Lecture - PHY101

# **Important Subjective**

# What is physics?

Answer: Physics is the study of the fundamental laws that govern the behavior of the natural world.

#### What are some of the different areas of physics?

**Answer:** Some of the different areas of physics include mechanics, electromagnetism, thermodynamics, quantum mechanics, and relativity.

#### Why is studying physics important?

**Answer:** Studying physics is important because it provides a deeper understanding of the natural world, provides a foundation for many other sciences, and can be a rewarding and intellectually stimulating experience.

#### What is the difference between mechanics and electromagnetism?

**Answer:** Mechanics deals with the motion of objects and the forces that cause that motion, while electromagnetism is concerned with the interactions between electrically charged particles and magnetic fields.

#### What is thermodynamics?

Answer: Thermodynamics is the study of the behavior of heat and temperature in systems.

#### What is quantum mechanics?

**Answer:** Quantum mechanics deals with the behavior of subatomic particles and the principles of uncertainty and probability.

#### What is relativity?

Answer: Relativity describes the behavior of objects moving at high speeds or in strong gravitational fields.

# What is typically covered in an introductory physics course?

**Answer:** An introductory physics course typically covers the basic principles of physics, including the laws of motion, energy, and thermodynamics.

# What is a laboratory experiment in a physics course?

**Answer:** A laboratory experiment in a physics course provides hands-on experience with physics concepts and allows students to see these concepts in action.

#### What are some resources available to students who are interested in studying physics?

**Answer:** Resources available to students who are interested in studying physics include textbooks, online resources, academic journals, and physics courses.