

1/2

Mysteries of the sky

In this unit, students will dive into the fascinating world of water and explore the many "superpowers" that make it so unique and essential to life. Through engaging experiments and observations, students will investigate water's incredible ability to disappear (evaporate), stick to surfaces, climb against gravity, transform between states, and flow through environments.

Using the Scientific Method as a guide, students will develop their questioning and reasoning skills as they uncover the science behind these mysterious and powerful behaviours. This unit will build a deeper appreciation for the role water plays in our world while sparking curiosity about the science all around us.

3/4

Heat and Energy

Students will be exploring the majority of the Scientific Method in order to investigate questions about the nature and behaviour of energy in our universe, with a particular focus on heat. They will use observation, experimentation, and analysis to uncover how energy works and why it behaves the way it does in different situations. This learning journey will take students from the vast energy produced by stars to the tiny interactions within atoms, as they explore how energy is created, transformed, and characterised. Along the way, students will experiment with how heat moves from one object to another, gaining a clear understanding of key concepts such as conduction, convection, radiation, and entropy. These discoveries will help them connect scientific theory with everyday phenomena in meaningful and engaging ways.

5/6

Heat and Energy

Starting with some of the smallest forms of matter, students investigate how atoms make up everything in our universe and how their properties influence the world around us. Through hands-on activities and guided inquiry, they will build an understanding of these building blocks of matter and their role in the physical world. Exploring the Scientific Method in greater depth, students will apply their curiosity and critical thinking skills to investigate key concepts such as electric charge, friction, magnetic fields, insulators, and batteries. These investigations will help students uncover the foundations of electricity and better understand how it powers our everyday lives.