

EVERYDAY CHEMISTRY

Designed for Students

Grades 4th-9th
Ages 8-15

Program Length

3 hours

Park Location

Epcot®

SYNOPSIS

Within the setting of *Epcot*®, chemistry is de-mystified as students come to understand that it isn't limited to a lab—it's happening all the time and all around us!

The learning adventure begins with an examination of some everyday items and the elements: carbon, hydrogen, and oxygen. Students become acquainted with the Periodic Table of the Elements and come to understand that when elements combine, they form compounds.

Hands-on activities with molecules and sodium polyacrylate illustrate the role of bonds between atoms and in chemical compounds, further demonstrating that chemistry is the science of change. A select attraction experience provides students with an opportunity to explore the connection between carbon, hydrogen and oxygen elements, photosynthesis, energy and our natural resources.

A polymer demonstration and guided discussion pave the way for a discovery of natural and synthetic polymers. Students construct a polymer model and create an elastomer showcasing how chemistry has filled the gap in providing solutions to meet the needs of humankind.

A select attraction and additional activities further illustrate that chemistry is practical problem-solving for today's challenges. Students are called to action to activate their curiosity and explore chemistry by taking a class, visiting some cave formations, touring a science museum or a chemistry lab, or through a little kitchen cooking.

LEARNING OUTCOMES

After completing Everyday Chemistry, participants will be able to:

- ✓ Define "chemistry" and "photosynthesis"
- ✓ Illustrate the role of carbon, hydrogen, and oxygen in sources of energy
- ✓ Demonstrate how elements can be manipulated to create synthetic substitutes and are the building blocks of everything
- ✓ Explain two types of polymers:
 - natural
 - synthetic polymers
- ✓ Create an elastomer
- ✓ Recognize The Periodic Table of the Elements
- ✓ Identify carbon, hydrogen, and oxygen elements on The Periodic Table of the Elements
- ✓ Build a model of a water molecule, a glucose molecule and a linear polymer
- ✓ Articulate and demonstrate the benefits of chemistry



DECA endorses
Disney Youth Education Series.



National Association for Gifted Children
endorses Disney Youth Education Series.



Disney Youth Education Series programs are accredited
by the Northwest Accreditation Commission.