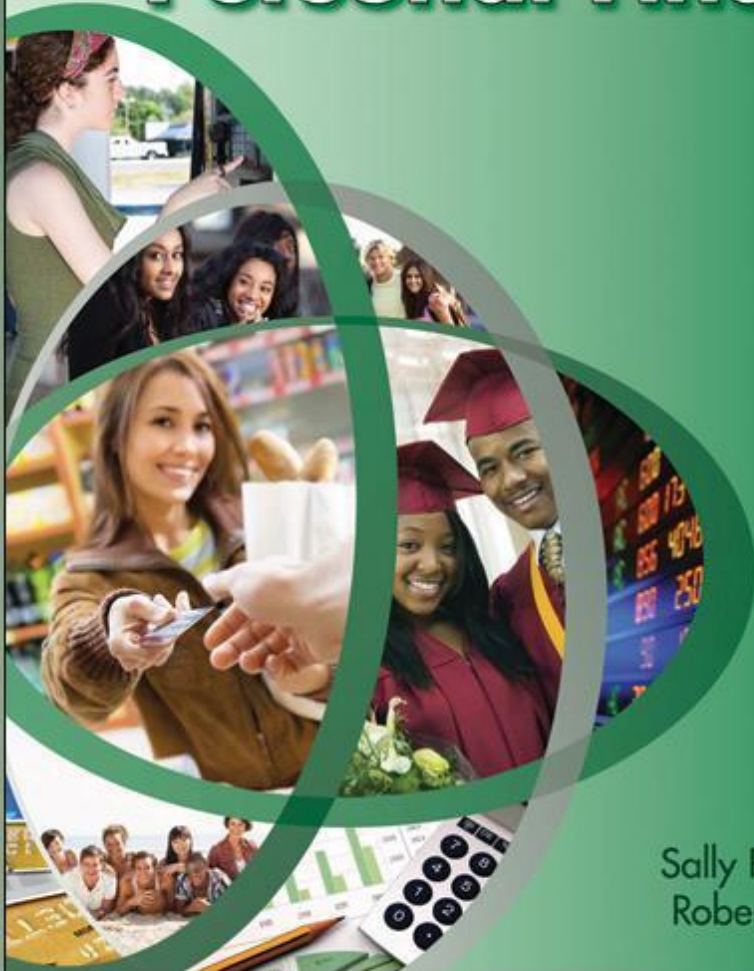


**G-W** Goodheart-Willcox Publisher

# Foundations of Personal Finance

Ninth Edition



Sally R. Campbell  
Robert L. Dansby

*PowerPoint Presentations for*

# Foundations of Personal Finance

by Lynn Falk

Gladys Porter Early College High School

Alberto Velez

Brownsville, Texas

**G-W**  
PUBLISHER

The Goodheart-Willcox Co., Inc.  
Tinley Park, Illinois

# Chapter 17

## **Your Role in the Environment**



Section 17.1

# **ENVIRONMENT**

# Objectives

- Discuss the importance of natural resources in modern society.
- Outline today's major environmental challenges.

# Terms

- sustainable
- conservation
- ecology
- environmentalist
- climate change
- global warming
- landfill
- hazardous waste
- fossil fuel
- renewable energy
- biofuel
- nonrenewable energy

# In Your Opinion

What role do each of the following play in protecting the environment?

- Government
- Businesses
- Local communities
- Individuals

# Limited Natural Resources

- **Sustainable** means able to be kept in existence
- **Conservation** is the protection and management of the environment and valuable natural resources

# Did You Know?

In 1950, the world population was approximately 2.5 billion people. In 2000, it had grown to over 6 billion people. By 2012, it had grown to 7 billion people.



# Environmental Challenges

- **Ecology** is the study of the relationship between living things and their environment
- An **environmentalist** is a person concerned with the quality of the environment and how to maintain it

# Climate Change

- **Climate change** is shifts in climate measurements that last decades or longer
  - Temperature
  - Precipitation
  - Wind
- **Global warming** is a steady rise in average temperatures near the earth's surface

# Climate Change (Continued)

## Possible Results of Climate Change

- *Rising sea levels and flooding.* Ice in arctic regions and high altitudes would melt faster if temperatures rise. This would release large volumes of water, possibly flooding many coastal areas.
- *Weather pattern changes.* Some regions would suffer water shortages and drought. Warmer oceans would trigger more hurricanes, which could cause flooding.
- *Famine.* Extreme weather changes would threaten crop production in many regions, causing food shortages.
- *Animal and plant extinction.* Weather would probably change faster than many plants and animals could adjust. In the short term, animals would probably try to migrate to more comfortable climates that supported familiar food supplies. Plants, however, would likely die off.
- *Human migrations.* Flooded coastal areas plus shortages of food and safe water could force millions of people from their homes. This might lead to regional conflicts.

# Did You Know?

- Greenhouse gases, from driving cars and burning coal, form an atmospheric layer that prevents heat from escaping
- Deforestation removes trees which normally absorb carbon dioxide; deforestation causes more carbon dioxide to remain in the atmosphere

# Waste Disposal

- A **landfill** is a permanent waste disposal site for most solid, nonhazardous waste
- **Hazardous waste** includes liquid, solid, or gas substances that are dangerous or potentially harmful to health or the environment

# Dwindling Resources

- **Fossil fuel** is organic substance, such as coal, petroleum, and natural gas derived from the decomposed remains of animals and plants that lived in prehistoric times
- Burning fossil fuels is the major source of greenhouse gases

# Dwindling Resources (Continued)

- **Renewable energy** is a power source that is continually available or can be replenished (examples: wind, water, sun, biofuels)
- **Biofuel** is produced from biological raw materials (example: ethanol is made from corn or sugar beets)
- **Nonrenewable energy** is a power source that can be used up or cannot be used again

# Clean Water

- The availability and quality of water are important environmental issues
- Demands for fresh water increase with population growth
- Many of the common items we buy require huge amounts of water to manufacture
- Hundreds of gallons of water are used in the production of one pair of denim jeans



# Urban Sprawl

- Cars give people mobility, causing homes and businesses to be built along highways that lead to and from city centers
- Open land is converted into housing developments, roads, malls, and businesses
- This dispersed development is called *urban sprawl*, and it can lead to elimination of forested areas and farmland

# Review 17.1

- What is the name for the protection and management of the environment and valuable natural resources?
  - Conservation
- What is a liquid, solid, or gas substance that is dangerous or potentially harmful to health or the environment?
  - Hazardous waste

Section 17.2

# **ADDRESSING ENVIRONMENTAL CHALLENGES**

# Objectives

- Explain steps individuals can take to conserve natural resources and protect the environment.
- Explain steps citizen groups can take to conserve natural resources and protect the environment.
- Identify the role of government in protecting the environment.
- Explain steps businesses can take to reduce their impact on the environment.

# Terms

- biodegradable
- home energy audit
- recycle
- composting

# What You Can Do

- Shop wisely, look for energy- and water-saving features
- Buy preowned items when they meet your needs

# What You Can Do (Continued)

- Buy biodegradable products that can be broken down naturally (example: cardboard, and using reusable shopping bags instead of plastic)
- Support businesses that operate recycling and take-back programs
- Shop locally; transporting products uses fuel

# Conserve Energy

- A **home energy audit** is an assessment of how much energy your home uses and ways to reduce consumption
  - Monitor heating and cooling
  - Insulate your home
  - Conserve hot and cold water
  - Use appliances and electrical devices wisely
  - Green energy (wind and solar power)



# Reduce Waste

- To **recycle** is to reprocess resources so they can be used again (paper, plastic, glass, metals, compact fluorescent lightbulbs, appliances, electronics)
- **Composting** is a natural process that transforms yard and other organic waste into useful soil-like particles

# Make Each Mile Count

- Switch from driving to biking, walking, or using public transportation when possible
- Limit airplane travel, and maintain your car
- Consider buying a small car
- Plan trips to combine errands and carpool when possible
- Lower your driving speed (cars at 55 mph get about 20 percent better fuel economy than 75 mph)

# Discussion

What are ways that you and your family conserve energy and natural resources?

# What Citizen Groups Can Do

- Launch recycling programs
- Create composting centers
- Organize clean-up days for parks, playgrounds, and beaches
- Encourage carpooling

# What Government Can Do

- Regulation and legislation
  - Environmental Protection Agency (EPA) focuses on air and water quality, noise, solid and hazardous wastes, toxic substances, and other issues
  - Department of Energy (DOE) sets efficiency standards for major home appliances and commercial products and sets maximum water-use standards for certain products

# What Government Can Do (Continued)

- Taxation
  - Green tax for excess household waste and auto emissions
  - Tax benefits for insulating homes, using solar energy, purchasing fuel-efficient cars and appliances
- Clean energy development (solar, wind, water)
  - Tax fossil fuels
  - Provide incentives for clean energy research

# What Government Can Do (Continued)

- Water conservation
  - Bans, restrictions, and rationing for different types of water usage
  - Local building codes requiring water-efficient faucets, toilets, showers, and appliances
  - Higher utility bill rates for excess water usage
  - Increased recycling of industrial water
  - Public education programs
  - Water meter accuracy and leak detection

# What Businesses Can Do

- Design products to be upgraded instead of discarded
- Incorporate energy-saving features
- Use recycled materials
- Avoid excess packaging
- Use renewable energy and recycled water
- Upgrade machinery and vehicles to save energy
- Minimize pollutant discharge into the environment



# Review 17.2

- What is an assessment of how much energy your home uses and ways to reduce consumption?
  - Home energy audit
- What is the government agency that focuses on air and water quality, noise, solid and hazardous wastes, toxic substances, and other environmental issues?
  - Environmental Protection Agency (EPA)