

# **Sustainable Farming Explorers**

### **Objective:**

Students will explore the principles of sustainable farming, learning how food is grown while protecting the environment and understanding the connection between farming, biodiversity, and climate change.

### **Activity Title:**

"Grow, Protect, Sustain: The Future of Farming"

Age Group: KS2 Duration: 1.5-2 hours

# National Curriculum Links:

- Science: Understand how plants grow and reproduce, recognise the importance of pollinators and decomposers in ecosystems.
- Geography: Explore how food is produced and the impact of human activities on the environment.
- **PSHE:** Develop a sense of responsibility for sustainable choices.

### Materials Needed:

- Planting materials: biodegradable pots, soil or compost, seeds (e.g., vegetables or herbs).
- Tools: small trowels, watering cans, or spray bottles.
- Natural materials: leaves, twigs, stones, pinecones.
- Flashcards or posters about sustainable farming practices (crop rotation, composting, wildlife habitats).
- Clipboards, pencils, and worksheets for note-taking or sketching.

# **Activity Plan:**

- 1. Introduction: "What is Sustainable Farming?" (15 minutes)
  - Begin with a discussion:
    - What does a farmer do?
    - Where does our food come from?
    - Why is sustainability important in farming?
  - Introduce sustainable farming practices through flashcards or visuals:
    - Crop rotation to keep soil healthy.
    - Using compost instead of chemical fertilisers.
    - Creating wildlife habitats like hedgerows.
    - o Conserving water and reducing waste.



# 2. Sustainable Farming Challenge: "Design Your Farm" (30 minutes)

- Students work in small groups to design a model sustainable farm.
  - Use natural materials (twigs, leaves, stones) to represent elements like:
    - Crops (twigs or leaves).
      - Livestock areas (stones).
    - Wildlife habitats (pinecones, moss).
- Each group includes sustainable features such as:
  - A pond for water conservation.
  - Bee-friendly plants for pollination.
  - Compost heaps for recycling waste.
- Groups sketch or write about their farm designs to share later.

# 3. Planting Activity: "Grow Your Own Food" (30 minutes)

- Each student plants a seed in a biodegradable pot, using compost.
  - Discuss how sunlight, water, and soil health are essential for growth.
- Relate planting to sustainable farming by highlighting:
  - Growing your own food reduces packaging and food miles.
  - Compost enriches the soil naturally.

# 4. Reflection and Sharing (15 minutes)

- Groups present their farm designs, explaining how they incorporated sustainable practices.
- Discuss the importance of balancing human needs with environmental care.
- Encourage students to brainstorm actions they can take at home or in school, such as reducing food waste, planting flowers for pollinators, or starting a compost bin.

### **Outcomes:**

- Students understand the importance of sustainable farming and its role in protecting biodiversity and the environment.
- They learn how to apply sustainable practices in real-world scenarios.
- They develop teamwork, problem-solving, and environmental stewardship skills.

### **Extension Ideas:**

- Farm-to-Table Connection: Plan a cooking session with vegetables grown in a school garden.
- **Biodiversity Survey:** Identify pollinators, decomposers, and other key species in the area.
- **Research Project:** Explore the impact of unsustainable farming practices like deforestation and soil erosion.
- Community Link: Partner with a local farm to learn about real-world sustainable practices.