

# ECOSYSTEM RESTORATION PLANNING



## KEYWORDS

restoration ecology

conservation biology

native species

ecosystem services

habitat restoration

Restoration ecologists and conservation specialists repair damaged ecosystems and bring back native plants and wildlife. They study soil, water, plants, and animals to understand how ecosystems work. These experts plan and lead projects that clean up pollution, stop erosion, plant native species, and create habitats for wildlife. Healthy ecosystems provide services like clean air, water purification, flood control, and recreation. Green jobs in restoration help fight climate change by increasing biodiversity and capturing carbon dioxide. They also help communities recover from environmental damage and make natural areas more resilient to climate change.

## AGE RANGE

9-11 years

## SMALL GROUP

(3-4 students)

## DURATION

45 minutes

## MATERIALS

- Local area maps
- Native plant identification guides
- Clipboards
- Measuring tapes
- Assessment worksheets
- Colored pencils



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## PROCEDURE

1. Survey designated outdoor area and document current conditions
2. Identify existing plants using field guides
3. Assess area needs (erosion control, wildlife habitat, etc.)
4. Select appropriate native species for restoration
5. Create visual restoration plan with timeline
6. Present plans and explain plant choices

## INSTRUCTIONAL GUIDELINES FOR FACILITATOR

- Choose safe, accessible outdoor area for surveys
- Provide region-specific plant identification guides
- Help students understand ecological relationships
- Connect to conservation and restoration careers



## LEARNING OUTCOMES

- Understand ecosystem restoration principles
- Learn about conservation biology careers
- Practice field observation and scientific planning

## EXTENSION SUGGESTIONS

- Participate in local habitat restoration projects
- Create native plant garden at school
- Monitor local ecosystem changes over time

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