

NAKHCHIVAN
STATE
UNIVERSITY

20
24

SDG PROGRESS REPORT



THE GLOBAL GOALS

15 LIFE
ON LAND





Introduction

Nakhchivan State University continues to demonstrate its commitment to Sustainable Development Goal 15 – Life on Land through hands-on conservation, education, and collaboration with national environmental authorities.

In 2024, NSU expanded its initiatives to:

- Rehabilitate degraded forest zones,
- Support native animal populations,
- Conduct research on endangered flora and fauna,
- Raise student and public awareness of ecosystem preservation.

Working closely with the Ministry of Ecology and Natural Resources, NSU has not only preserved local habitats but has also helped reinforce biodiversity resilience in the face of climate and human pressures. These initiatives align with global sustainability efforts while preserving the unique ecological landscape of the Nakhchivan Autonomous Republic.

Field Research, Reintroduction & Reforestation Projects

Reforestation and Native Species Planting

- In 2024, NSU collaborated with the Nakhchivan Ministry of Ecology to plant over 2,300 native saplings in semi-arid zones of Babek and Julfa regions.
- Species planted included:
 - *Quercus iberica* (Caucasian oak)
 - *Populus alba* (white poplar)
 - *Pinus eldarica* (Eldar pine – native to the region)
- Planting sites were chosen based on soil erosion risk and biodiversity restoration needs.
- These efforts built on the 2023 campaigns, showing a 12% increase in total reforested area.

Wildlife Reintroduction and Protection

- The university's Ecology Research Lab participated in a project to monitor and support the population recovery of the Armenian Rock Lizard and Eurasian Tortoise, both vulnerable species found in the Nakhchivan region.
- Student volunteers helped:
 - Track movement via GPS tagging
 - Monitor nesting grounds
 - Raise awareness through exhibitions and workshops

Soil & Flora Monitoring Projects

- NSU students and faculty conducted bi-monthly field trips to study rare endemic plants such as *Iris elegantissima* and *Astragalus* spp.

- Soil sample analysis focused on:
 - Salinity trends,
 - Impact of climate change on soil microfauna,
 - Signs of pesticide contamination in agriculture zones.



Research on Local Flora and Fauna

Scientific Studies by NSU's Faculty of Biology and Ecology

In 2024, NSU's academic departments expanded their efforts to document, analyze, and conserve local biodiversity, particularly within the unique ecosystems of the Nakhchivan Autonomous Republic.

Flora Studies

- Endemic Plant Monitoring:
 - Students and faculty catalogued over 35 species of endemic and rare plants in the Zangezur Mountains and Ordubad Forests.
- Notable species included:
 - *Iris elegantissima*
 - *Tamarix ramosissima*
 - *Astragalus dasyglottis*
- Herbarium Expansion:
 - NSU's herbarium collection added 90 new specimens, digitally labeled and catalogued for research and education.
- Threat Mapping:
 - GIS-based mapping was used to identify climate-sensitive zones where flora species are declining due to drought and soil salinization.

Fauna Research

- Observation of Key Species:
 - Long-term observation projects documented species such as:
 - Caucasian agama (*kərtənkələ*)
 - Eurasian golden jackal
 - Eastern imperial eagle (recorded in Julfa highlands)
- Camera Trapping Initiative:
 - In cooperation with local forestry services, six camera traps were installed in protected areas.
- These captured images of:
 - Nocturnal mammals (e.g., foxes, martens)
 - Bird nesting behaviors in semi-arid environments
- Field Reports:
 - Results were published in faculty bulletins and used for bachelor theses in the fields of Zoology and Environmental Sciences.









