CAPPADOCIA UNIVERSITY
Logic - Wisdom - Equality - Tradition

SUSTAINABLE DEVELOPMENT GOALS • ANNUAL REPORT

Living landscapes. Shared responsibility.

SDG 15 / LIFE ON LAND

15 LIFE ON LAND

Protecting terrestrial biodiversity through knowledge, ecological learning, research and partnerships.

Cappadocia University | Reporting Period: 2025



2025 • CAPPADOCIA UNIVERSITY • ENGLISH EDITION

2025 IN PERSPECTIVE

From botanical knowledge to ecological responsibility

We connect documentation of Cappadocia's living landscapes with education, scientific enquiry and community participation.

Our approach to SDG 15 begins with the recognition that the region's valleys, steppe ecosystems, agricultural landscapes and endemic flora form a living heritage alongside its historical and cultural assets. We make this heritage more visible through the **Cappadocia Vegetation digital inventory**, interdisciplinary teaching, **field-based activities** and research that examines how land-use decisions affect sensitive habitats.

In 2025, our work included nature activities in the Ihlara and Gomeda valleys, an educational visit to the Sultan Marshes, ecological learning opportunities, the publication of two issues of Ecocene, research on land-use pressures near Hürmetçi Marsh and public dialogue about biodiversity and agroecology. Each contributes differently: awareness, open information, academic evidence or opportunities for participation. We do not equate a field visit with habitat restoration, or an online plant record with a newly discovered species.

Three mutually reinforcing areas of contribution

Knowledge and research	Learning and engagement	Institutional stewardship
Publicly accessible plant records; land-use scholarship; environmental humanities	Student nature walks; ecological literacy; biodiversity and food-systems conversations	Environmental policy, responsible campus practice and partnerships with civil society

Interpreting the year

We distinguish 2025 calendar-year activity from 2024–2025 academic-year participation and from the cumulative contents of our botanical inventory. Maintaining these boundaries makes the scale and character of our contribution understandable and comparable.

PERFORMANCE PROFILE

2025 biodiversity and engagement in context

The indicators below record distinct outputs. They are not combined into a single impact total.

45	286	101
PLANT SPECIES	**PLANT PHOTOGRAPHS**	**ACTIVITY PARTICIPATIONS**
Cumulative inventory	Cumulative inventory	Four 2025 field events

4	2	3
2025 NATURE ACTIVITIES	**ECOCENE ISSUES**	**BIODIVERSITY SESSIONS**
Selected register	June & December 2025	May 2025 programme

Nature-based participation across the 2024–2025 academic-year record

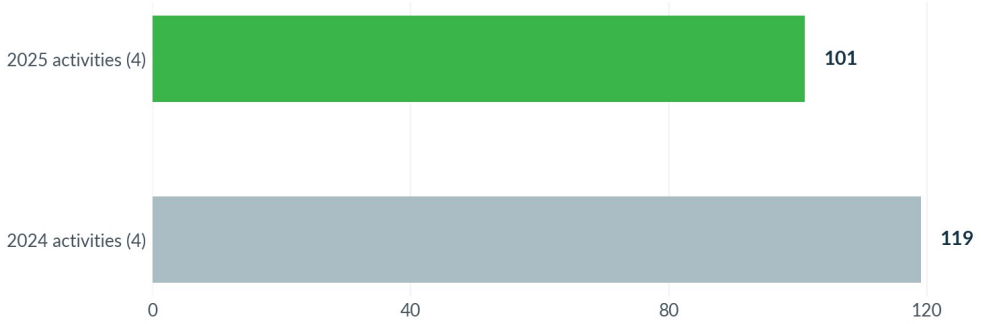


Figure 1. Participation records in eight selected nature activities, separated by calendar year (119 in 2024 and 101 in 2025).

Eight selected activities account for **220 participation records**: **119** across four events in late 2024 and **101** across four activities in 2025. The figures refer to recorded attendances, not 220 distinct individuals. The botanical inventory's 45 species and 286 photographs are **cumulative records**; they are not presented as new discoveries or additions made solely during 2025.

INSTITUTIONAL APPROACH

Protecting natural heritage through our policies

We treat nature conservation as an ongoing institutional responsibility across teaching, research, operations and regional partnerships.

Our 2023–2028 Strategic Plan places sustainability alongside education, research, university governance and community engagement. Our Environment and Sustainability Policy establishes an institutional direction for biodiversity, ecological balance, natural-resource stewardship and environmental awareness. Our Community Contribution Goals and Principles Policy encourages cooperation with regional stakeholders on the protection of natural and cultural heritage.

We apply these commitments through the Sustainability Office, Sustainability Commission, academic units, research centres, student societies and operational departments. The Environmental Handbook sets out responsibilities for identifying environmental aspects, monitoring, compliance and continuous improvement. The KÜN Hayat programme links these responsibilities with the protection of Cappadocia's natural and cultural environment.

Institutional mechanism	How it contributes to SDG 15
2023–2028 Strategic Plan	Connects the sustainability commitment with research, teaching and regional development
Environment and Sustainability Policy	Articulates responsibilities for ecological balance and natural-resource protection
Sustainability Office and Commission	Support coordination, monitoring and institution-wide engagement
KÜN Hayat and Environmental Handbook	Translate environmental responsibility into practical and educational processes

Our institutional policies provide a governance framework for ecological responsibility, while the assessment of direct ecological outcomes requires systematic monitoring and evidence. In 2025, we strengthened biodiversity documentation, ecological education and scientific research, although measurable increases in habitat area or the recovery of species populations have not yet been established.

BIODIVERSITY DOCUMENTATION

Cappadocia Vegetation: a public botanical record

Our digital flora resource makes local plant diversity more recognisable and accessible to the communities who share the landscape.

Through the Cappadocia Vegetation platform, we share photographs and information about plants found in the region, including local names, scientific names, botanical families and endemicity. The published collection describes **45 plant species** and **286 photographs**. These are the platform's documented **cumulative holdings**, not the number of plants newly identified in 2025.



Figure 2. Selected botanical photographs from our Cappadocia Vegetation digital inventory.

Citizen science and contribution by the wider public

The resource draws in part on the photographic collection of **Halil Nuri Hepdinç**, whose extended field observations of Cappadocia's flora informed the platform. We invite nature enthusiasts and residents to contribute further photographs and observations. This participatory approach makes botanical knowledge more widely available and builds awareness of plants sometimes overlooked in everyday landscapes.

ENDEMIC FLORA

Recognising plants that need careful stewardship

The presence of endemic taxa reinforces the importance of documenting habitats before pressures on them become irreversible.

Our online endemic-species collection includes photographic records associated with Cappadocia locations such as Mustafapaşa, Devrent, Paşabağı and Göreme. Examples identified on the platform include **Scorzonera tomentosa** (Alabent), **Verbascum wiedemanianum**, **Phlomis sieheana**, Convolvulus assyricus and Astragalus stenosemius. We retain the taxonomic names as published by the platform and do not treat their inclusion as proof of current abundance or conservation status.

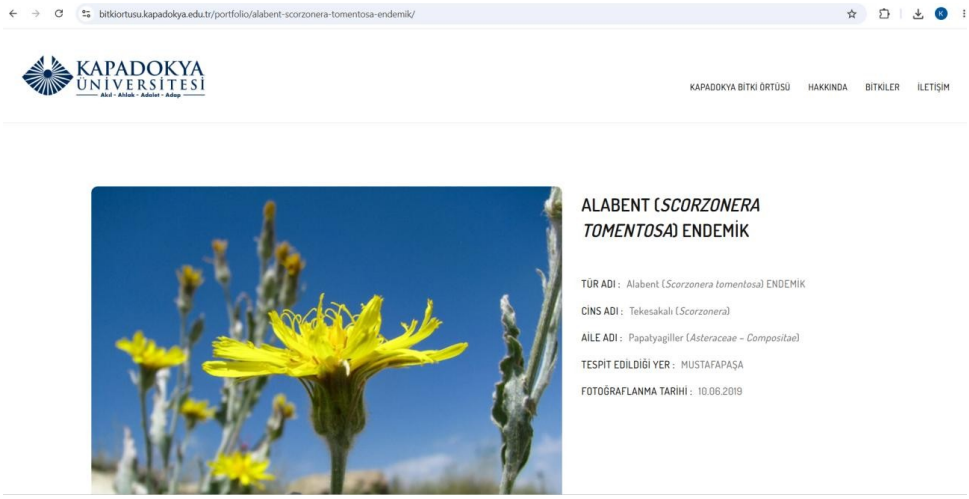


Figure 3. Species identification page from the Cappadocia Vegetation inventory, illustrating the pairing of an original plant photograph with botanical information.

The inventory's value lies in accessible identification and in demonstrating how the region's plant diversity is connected to cultural knowledge. Its public orientation supports ecological literacy and encourages vigilance around the effects of land conversion, infrastructure, intensive tourism and other pressures on sensitive habitats.

LEARNING IN NATURE

2025 field activities across Cappadocia

We use organised encounters with natural landscapes to complement classroom learning with direct observation and shared experience.

2025 date	Activity / location	Participation records
22 March	Sultan Marshes visit	11
20 April	Nature walk (route not confirmed in register)	36
3 May	Ihlara Valley exploratory visit	14
15 June	Gomeda Valley exploratory walk	40
TOTAL	Four selected 2025 activities	101



Figure 4. Student field learning in Ihlara Valley and Gomeda Valley, documented in our 2025 student activity bulletins.

The four selected 2025 activities generated 101 participation records. These activities support contact with landscapes and awareness of habitat diversity; the records do not by themselves demonstrate long-term behavioural change, a biodiversity survey or physical habitat restoration. The University's student societies use these experiences to connect learning with respect for natural places.

WETLANDS AND LANDSCAPES

Learning about fragile ecological connections

Wetlands illustrate how land, water, wildlife and human land use are intertwined.

On 22 March 2025, our Nature Society visited the Sultan Marshes for World Water Day. The March student bulletin documents the visit with photographs of participants at the Bird Museum and Promotion Centre and within the surrounding reedland landscape. The field experience provided a setting for thinking about water conservation and habitat sensitivity beyond campus boundaries.



Figure 5. Our Nature Society's visit to the Sultan Marshes on 22 March 2025, documented in the March student bulletin.

We describe this activity as ecological learning and public engagement, not a restoration intervention. As an inland wetland, the site also illustrates the interface between SDG 15 and SDG 14: terrestrial landscapes, birds, water and aquatic habitats form an interconnected ecological system. Our SDG 15 account emphasises landscape stewardship and biodiversity awareness rather than repeating the separate SDG 6 report's general water-consumption data.

COMMUNITY STEWARDSHIP

Tree-planting, valley care and student initiative

We encourage participation in the care of shared landscapes while documenting the difference between an event and a verified conservation outcome.

Student activity registers include tree-planting engagement at Eğmir Dağı on 19 April 2025, while our Sustainable Development Club publicised a Devrent Valley clean-up for 25 April 2025. These activities place care for the local environment within student life and create opportunities for shared responsibility. The April 2025 event records list 12 participants for the tree-planting activity and five for the clean-up entry; those figures refer to recorded participation, not to verified numbers of trees surviving or kilograms of litter removed.



Figure 6. Announcement of the 19 April 2025 tree-planting activity organised with student participation.



Figure 7. Announcement of the Devrent Valley environmental clean-up scheduled for 25 April 2025.

Where a programme is represented by an announcement rather than a completed-activity record, we avoid claiming measured restoration outcomes. The next step is to connect such participation with follow-up indicators for site condition, repeat engagement and, where applicable, planting survival.

LAND-USE RESEARCH

Examining pressure on sensitive landscapes

Our research approaches conservation through evidence about land-use decisions, development pressure and the ecological vulnerability of particular places.

In **2025**, **Leila Akbarishahabi** published "Environmental Sustainability and Land Use Decisions: Hürmetçi and KOIZ" in PLANARCH – Design and Planning Research, 9(1), 55–66 (DOI: 10.54864/planarch.1589525). The paper examines tensions between industrial land-use decisions and the ecological integrity of **Hürmetçi Marsh**, using literature review, observations and PESTLE analysis.

The research identifies conservation concerns and proposes more responsive planning approaches, including environmental safeguards, buffer zones, careful monitoring and community engagement. These are research recommendations; they are not presented as restoration works already implemented by our University.

Why land-use research matters

Pressure considered	Research relevance for terrestrial ecosystems
Location and expansion of industrial activity	Sensitive sites can face competing demands for land and infrastructure
Ecological integrity of wetlands and surrounding land	Land-based development can affect habitats at the water–land interface
Institutional and community responses	Planning, monitoring and engagement can help inform protective choices

This work connects academic research with regional environmental governance, strengthening the evidence available for considering biodiversity when development choices are made.

RESEARCH AND ENVIRONMENTAL KNOWLEDGE

Linking traditional knowledge, ecosystems and sustainability

Scientific analysis and community knowledge provide complementary ways to understand ecological relationships.

Our research portfolio includes a project on transforming traditional ecological knowledge into contemporary sustainable living practices through the example of Anatolian Yörük–Turkmen culture. This work recognises that landscapes carry practices, observations and cultural memory as well as biological species. It strengthens the cultural dimension of our approach to terrestrial conservation.

Other projects address environmental monitoring and pollution pressures in regional watersheds. Although these belong primarily to aquatic-ecosystem research, their findings can inform broader understanding of human pressures in connected landscapes. We keep the specific research purposes distinct rather than presenting every environmental study as terrestrial habitat restoration.

Research connected to SDG 15

Area	2025 contribution and appropriate interpretation
Land-use planning	Published analytical research on development pressures and the Hürmetçi landscape
Traditional ecological knowledge	Ongoing research into cultural practices and sustainable living
Botanical documentation	Cumulative open inventory supporting identification and awareness
Interdisciplinary ecological enquiry	Public scholarship linking biological, cultural and ethical questions

We maintain a clear distinction between published findings, ongoing projects, policy commitments and direct work in the field. This is essential for interpreting what we achieved during 2025 and what remains a future priority.

ECOLOGICAL LITERACY

Making ecosystems visible in teaching and public dialogue

We teach ecological responsibility through natural science, the arts, cultural analysis and everyday decisions.

Our Eco Curriculum includes Ecological Literacy and Sustainability, an institution-wide elective that addresses human–environment interdependence, the climate crisis, consumption, environmental justice and the rights of living systems. The curriculum helps students explore the ecological consequences of choices rather than treating sustainability as a topic for a single specialist discipline.

During 2025, our student and public programmes included an online talk on environmental problems and significant environmental thinkers on 5 March, nature-focused exhibitions and opportunities for creative reflection through a climate-change photography competition. These activities complement outdoor field learning by providing intellectual and cultural frameworks for understanding biodiversity.

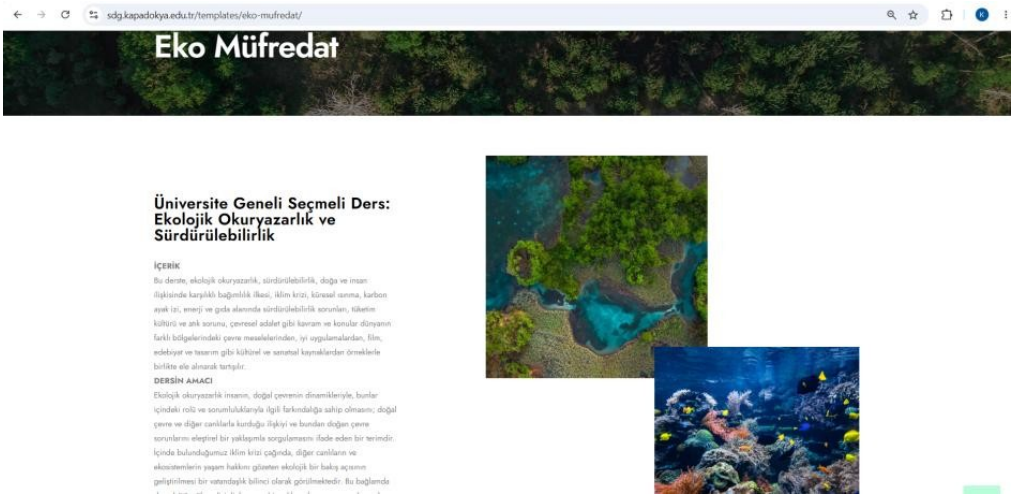


Figure 8. Our Eco Curriculum public information page, including the Ecological Literacy and Sustainability course.

We recognise awareness activities as learning and engagement outputs. They are not used as a substitute for direct measurement of ecological recovery or for evidence that a particular site received legal protection.

ENVIRONMENTAL HUMANITIES

Opening interdisciplinary conversations about life on land

Our research and publishing platforms connect ecology with cultural interpretation, ethics and human–nonhuman relationships.

Through the Environmental Humanities Center and Ecocene: Cappadocia Journal of Environmental Humanities, we support academic exchange on ecological change, multispecies relationships, environmental justice and the place of non-human life in social and cultural thought. In 2025, Ecocene published Volume 6, Issue 1 in June and Volume 6, Issue 2 in December. These are verified scholarly publication outputs rather than measures of species abundance.



Figure 9. Ecocene, our peer-reviewed open-access journal of environmental humanities.

The June issue included scholarship examining representations of animals and nature, while the December issue addressed the environmental dimensions of the COVID-19 pandemic and themes such as deforestation and environmental injustice. Publishing across disciplines broadens public access to ecological ideas and connects researchers working beyond traditional disciplinary boundaries.

AGROECOLOGY AND LIVING LANDSCAPES

Biocultural diversity and local food systems

We link regional production knowledge and biodiversity awareness through conversations with producers, researchers and the wider public.

The Cappadocia Gastronomy Festival, held on 21–25 May 2025, brought biocultural heritage into public discussion. Sessions on 22–23 May addressed safeguarding cultural and biological diversity, agroecological agriculture, social justice and biodiversity in food systems. The Cappadocia–Uçhisar Slow Food Earth Market opened on 24 May 2025 as a platform through which local producers and consumers could meet and exchange knowledge.



Figure 10. Public discussion on food systems and biodiversity during the 2025 Cappadocia Gastronomy Festival.

These collaborations help connect agricultural landscapes with ecological awareness and traditional food knowledge. Our report describes them as knowledge exchange, producer engagement and community participation; we do not claim that the events themselves establish measured increases in farmland biodiversity.

PARTNERSHIPS FOR TERRESTRIAL STEWARDSHIP

Connecting knowledge, communities and civil society

We extend ecological engagement through cooperation with student groups, conservation organisations, local producers and academic networks.

Our cooperation landscape includes student initiatives involving TEMA, nature and sustainability societies, relationships with local producers developed through Slow Food, and the interdisciplinary networks associated with our research centres and journals. In 2025, these relationships supported field participation, ecological awareness and conversations about nature-sensitive production and landscape use.

The Environmental Sustainability Leadership Award for the 2024–2025 academic year recognised Mehmet Erdoğan for student engagement in environmental initiatives. It forms part of our educational approach to leadership and participation; the award is not treated as evidence of a measured ecological outcome.

What we can document and what we will monitor

Documented in our 2025 record	Priority for stronger future monitoring
Public botanical inventory and openly described endemic taxa	Update dates, curation, validation and trends in verified species records
Dated field visits and participation registers	Participant continuity, learning outcomes and follow-up engagement
Research publications and active projects	Research application and documented changes in management practice
Tree-planting and clean-up activity records	Planting survival, site condition, volunteer effort and waste removed

We will continue to use these distinctions when assessing how education and research contribute to the protection of habitats and species, particularly where evidence moves from awareness towards direct conservation action.

OUR CONNECTED CONTRIBUTION

Protecting living heritage through shared responsibility

Our SDG 15 work gains meaning when it is connected to the other environmental and social priorities of our University.

Related goal	Connection to our 2025 SDG 15 activity
SDG 4 – Quality Education	Ecological literacy, nature-based student learning and open knowledge
SDG 6 – Clean Water and Sanitation	Water–land interactions and the conservation value of wetland landscapes
SDG 11 – Sustainable Cities and Communities	Planning choices and the protection of natural and cultural heritage
SDG 12 – Responsible Consumption and Production	Agroecology, local production knowledge and resource-aware practice
SDG 13 – Climate Action	Landscape resilience, environmental awareness and habitat-sensitive planning
SDG 17 – Partnerships for the Goals	Student societies, conservation networks, producers and academic cooperation

Priorities for continuing improvement

We intend to strengthen the curation and public value of our botanical inventory, maintain opportunities for field learning, increase the visibility of regionally relevant biodiversity research and improve the indicators used to evaluate nature-related initiatives. These priorities build on existing 2025 activity but should not be confused with results already achieved.

Our contribution to Life on Land is expressed through the continuing relationship between documented botanical heritage, scientific enquiry, ecological education and community action. By bringing these together, we aim to support a culture in which Cappadocia's living landscapes are understood as a shared responsibility that extends beyond campus boundaries.