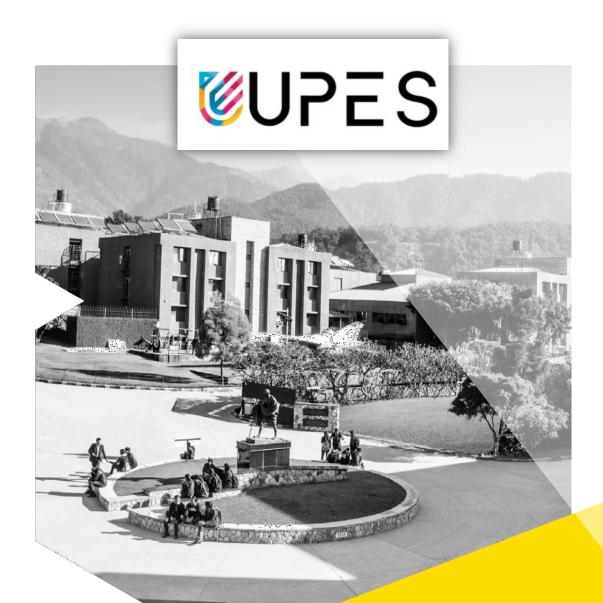


## SUSTAINABLE DEVELOPMENT GOALS



**SDG 15: LIFE ON LAND** 

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#### SDG 15: LIFE ON LAND

# UPES University SDG 15: Life on Land Sustainability Report (2019–2024)

Sustainable Development Goal 15 (SDG 15) focuses on protecting, restoring, and promoting the sustainable use of terrestrial ecosystems, halting biodiversity loss, and fostering ecological balance [1]. UPES University, situated in the biodiverse state of Uttarakhand (where ~72% of land is forested) [2], is uniquely positioned to advance SDG 15. Over the last five academic years (2019–2024), UPES has implemented a comprehensive range of initiatives in biodiversity conservation, afforestation, sustainable land use, research, and community engagement. This report outlines these initiatives – along with evidence of their impact – in a structured format aligned with THE Impact Rankings requirements.

#### Biodiversity Protection Initiatives on Campus and in the Community

#### Green Campus and Biodiversity

UPES maintains a green campus with extensive tree cover and biodiversity-friendly landscaping [3]. Organic gardening practices and rainwater harvesting on campus help sustain local ecosystem services [3]. The **School of Health Sciences & Technology** has established a tranquil **Herbal Garden** where faculty and students cultivate native medicinal plants, fostering a deep connection to the region's flora [3]. B.Pharm students play a leading role in nurturing species such as *Bael, Neem, Pomegranate, Amla, Fig, Indian jujube,* and *Sansevieria* in this garden [3]. These efforts not only enrich campus biodiversity but also serve as a living laboratory for learning about plant taxonomy and conservation.

#### Community-Focused Biodiversity Projects

Through **Project Vikalp** (a Rural Women Technology Park initiative running since 2015), UPES has empowered over **625 rural women** in neighboring villages by training them in eco-friendly enterprises [1]. These include manufacturing recycled-paper "woodless" pencils, crafting sustainable handicrafts, and cultivating **medicinal and aromatic plants** suited to the local climate [1]. This initiative simultaneously conserves indigenous plant species and provides livelihoods. In recognition of national biodiversity efforts, UPES was also a contributing organization to India's **"Status of Leopards 2018" report** released by the central government [4]. This contribution underscores UPES's engagement in wildlife research and policy, aiding the conservation of a key predator species (leopards) and their habitats.

#### Habitat Conservation and Land Restoration

UPES actively works with local authorities and communities to restore degraded habitats. For example, university experts provide technical guidance for **community-based conservation models**, such as rehabilitating village common lands and preventing soil erosion on hillsides [3]. The university has established polyhouses and nurseries for mass propagation of medicinal plants on campus [4], and offers ongoing **training and support to farmers in at least four nearby villages** (Than Goan, Birsani, Doonga, and Masraajpatti) to cultivate species like Tulsi (holy basil), Chamomile, Lemongrass, and Stevia [4] [3]. By integrating biodiversity conservation with economic development, these programs protect local plant genetic resources and promote sustainable land use in the community.

#### Reforestation and Afforestation Programs

#### Campus Tree Plantation

Preserving and expanding green cover has been a priority on campus. Native trees are planted during orientation programs and environmental observances, contributing to a steadily growing canopy each year. Through these efforts, the UPES campuses at Kandoli and Bidholi have become green oases, supporting diverse bird and insect life. Landscaping guidelines ensure any necessary tree removal is offset by planting multiple saplings, aligning with India's push for afforestation and a "land degradation-neutral" world by 2030 [1].

#### Community Tree Planting Drives

UPES has spearheaded or participated in numerous tree plantation drives in the region in partnership with government agencies and NGOs. Notably, in 2021 the university joined a local reforestation mission "Reviving Doon Valley", which in 2025 expanded into an ambitious campaign to plant 10,000 trees in the Dehradun valley during the monsoon season [5]. This campaign, led by the NGO Flora Saviors and the Divisional Forest Office, has seen enthusiastic participation from UPES students and staff volunteers. On 28 July 2025, for example, UPES student interns (through the Srijan program) assisted the Forest Department in a mass planting drive in Jhajhra Range, contributing to the success of the event [5]. Each sapling planted is geo-tagged and will be nurtured for at least three years to ensure high survival rates [5].

UPES has also collaborated with local schools and communities on smaller greening projects. On Independence Day 2023, the university helped organize a plantation of **120 saplings with students of Shigally Hill International School**, instilling environmental stewardship in young minds while augmenting green cover [5]. In another initiative termed "Fruit Forest for Animals", UPES volunteers joined officials and villagers in planting 200 fruit tree saplings in a forest fringe area (Dhaulas) to provide food sources for wildlife [5]. Such afforestation programs not only sequester carbon and improve air quality, but also create vital habitats that sustain local biodiversity and reduce human-wildlife conflicts.

#### Conservation and Sustainable Land Use Practices

#### Sustainable Campus Operations

UPES has embedded sustainable land use practices into its campus planning and operations. Buildings are designed to minimize their footprint on the hilly terrain, preserving natural drainage and vegetation wherever possible. A robust **rainwater harvesting** system is in place, recharging groundwater and feeding campus irrigation ponds to support landscaping [3]. Landscapes are maintained with organic compost (including bio-manure from on-campus waste processing) instead of chemical fertilizers, ensuring soil health and protecting insect life. The university follows a **"Clean and Green Campus"** policy that includes a ban on single-use plastics and regular campus clean-up drives, thereby reducing pollution on land. By **2024**, UPES reports comprehensive waste management (segregation and recycling programs) and water conservation measures, contributing to land and soil sustainability in line with SDG targets [3].

#### Conservation in Curriculum and Practice

Sustainable land management principles are also reinforced through academics and field practice. UPES offers courses and projects in environmental science, forestry, and sustainable agriculture that equip students to address land degradation challenges [3]. Faculty and students engage in practical conservation work, such as soil testing in local farms and assisting villages in developing watershed management plans. For instance, outreach teams from UPES have worked with farmers in Uttarakhand to promote terrace farming improvements and organic farming techniques, reducing soil erosion on slopes and enhancing land productivity [3]. These efforts help combat desertification risk in rainfed areas and ensure more sustainable use of land resources.

UPES also organizes awareness workshops on specific land ecosystems. **Wetland conservation** has been one focus, with events highlighting the importance of nearby wetlands in water purification, flood control, and carbon storage [3]. By educating campus and community members about the critical services provided by wetlands and forests, UPES encourages collective action to protect these ecosystems. Additionally, the university has taken steps to manage invasive plant species on campus and support local campaigns against invasive weeds in forest areas, aligning with the SDG 15 target of controlling invasive alien species by 2020 [1].

#### Research and Innovation Projects Focused on Terrestrial Ecosystems

#### Climate-Resilient Agriculture & Habitat Innovation (SWACHH Center)

UPES is host to a first-of-its-kind incubator dedicated to sustainable habitat solutions. In 2023, Dr. Nidhi Chauhan (School of Health Sciences & Technology) secured a prestigious grant from the Biotechnology Industry Research Assistance Council (BIRAC) to establish the "SWACHH" Incubation Centre at UPES [6]. SWACHH (Social Wellness, Agriculture, Clean and Hospitable Habitat) is Uttarakhand's first SPARSH-BIRAC center, and over the next 5 years it will mentor fellows and young innovators working on climate-resilient agriculture, farm-to-plate sustainable food systems, and public health technologies [6]. This initiative brings research, entrepreneurship, and community needs together – for example, developing drought-resistant crop varieties, smart irrigation systems, and clean energy solutions for rural areas – directly contributing to SDG 15 objectives of sustainable

agriculture and land use. The center is a collaboration with India's Department of Biotechnology and aligns with national innovation missions.

#### Medicinal Plant Research Laboratory

Building on the success of Project Vikalp, UPES established a Medicinal and Aromatic Plants (MAP) Research Lab under a Department of Science & Technology (DST) funded project (2015–2018) [3]. The MAP lab enables scientific exploration of indigenous plants for conservation and utilization. Equipped with extraction units (Soxhlet apparatus, Clevenger distillation, etc.) and analysis tools, the lab conducts studies on essential oil yield, antimicrobial properties, and optimal cultivation practices for species like lemongrass, tulsi (basil), stevia, and chamomile [3]. In recent years, faculty and students have used the lab to experiment with organic cultivation in different soil types and to produce natural extracts that can substitute synthetic chemicals. The university's polyhouse and outdoor nurseries, associated with this lab, ensure a year-round supply of saplings and serve as a training site for farmers (as noted, women farmers from nearby villages are invited for hands-on training in these facilities) [3]. Research from the MAP lab not only supports biodiversity (by encouraging the planting of native medicinal species) but also adds economic value through potential herbal products, illustrating innovation that links ecosystem health with community well-being.

#### Wildlife and Ecology Research

UPES faculty and students are increasingly engaged in terrestrial ecology research projects. The university has supported studies on forest fire ecology (understanding the role of natural fires in forest succession and diversity) as well as human-wildlife conflict mitigation in Himalayan regions. For example, a recent student dissertation examined patterns of forest regeneration after wildfires in Garhwal, aligning with the understanding that controlled natural fires can increase habitat diversity [3]. UPES was also an academic contributor to the National Leopard Survey 2018, lending its research expertise to wildlife population assessment and data analysis [4]. Furthermore, interdisciplinary teams at UPES's Center for Energy and Environment have worked on bioenergy and land restoration innovations - such as converting organic waste and invasive weeds into biochar or biogas - to reduce land pollution and improve soil fertility [3]. One flagship project (in collaboration with NGO Vikalp Nai Dishayen and funded by DST) established an integrated wastewater treatment plant on campus that uses microalgae to purify sewage and produces bio-fertilizer from the residual biomass [7]. This pilot plant, operational by 2023, demonstrates how circular economy approaches can address pollution while yielding resources (bio-manure) that enrich the soil, thereby preventing land degradation. These diverse research and innovation projects underscore UPES's commitment to developing practical solutions for sustaining land ecosystems.

#### Community Outreach and Environmental Education Programs

#### **Environmental Awareness Campaigns**

UPES conducts regular outreach programs to promote environmental stewardship both on campus and in the wider community. Each year, the university celebrates **World Environment Day**, **World Wildlife Day**, and similar eco-observances with public events, seminars, and drives. For instance,

students and faculty mark Wildlife Day by organizing exhibitions and talks highlighting the importance of forests and wildlife to local livelihoods (the 2021 theme "Forests and Livelihoods: Sustaining People and Planet" underscored this linkage [3]). These events educate attendees on the benefits of biodiversity and the urgency of combatting wildlife crime and habitat loss [3].

A signature annual event is "AtmosFair", an environment awareness program organized by the student-led Green Up club in the School of Engineering. In 2020, AtmosFair (held virtually due to the pandemic) featured a national webinar on "Climate Change, Risk Resilience & Livelihood Development," inaugurated by Padma Bhushan Dr. Anil P. Joshi of HESCO [8]. Experts from government, academia, and industry discussed topics from ozone layer protection to community-based conservation, reaching hundreds of students and local residents online. This event, now a tradition (7th edition in 2020), exemplifies how UPES brings thought leaders and the public together to inspire action for environmental protection [8].

#### Community Education and Outreach

Through its **Centre for Sustainable Development** and CSR wing, UPES runs outreach projects that engage local communities in conservation. Faculty and student volunteers have conducted workshops in neighboring villages on topics like **organic farming**, **watershed management**, and **fuelwood alternative technologies**. For example, in 2022, as part of a smart village initiative, UPES experts demonstrated solar cookers and biogas units to rural households to reduce dependence on forest wood, thereby helping to protect local forests. Training sessions on composting and waste management have been provided to village panchayats (councils) to prevent land and water pollution.

An important outreach program is the **Rural Women Technology Park (Project Vikalp)**, which not only empowers women (as described earlier) but also hosts community awareness days. Women entrepreneurs trained by UPES in making recycled paper products and herbal goods have become ambassadors for sustainability, teaching others about the importance of recycling and biodiversity-friendly income generation [1]. Additionally, UPES has collaborated with local schools on **"Ecoeducation"** – for instance, creating a biodiversity module for schoolchildren and hosting them for nature walks on the campus to learn about plant identification and bird watching. These educational partnerships instill environmental responsibility at a young age and strengthen UPES's community ties.

#### Public Campaigns and Advocacy

UPES often joins hands with government bodies for environmental campaigns. In the last five years, the university has lent support to the "Clean Doon, Green Doon" initiative (a citywide campaign for cleanliness and tree planting) by mobilizing volunteers and providing technical advice on waste recycling. UPES students participated in city clean-up drives and plantation events flagged off by the District Forest Office, demonstrating the university's civic leadership. Furthermore, UPES faculty serve as resource persons in regional consultations on forest policy, biodiversity action planning, and sustainable urban development, integrating the university's knowledge production with community advocacy. Through media engagement, including articles and radio talks by UPES experts, the university spreads awareness on pressing issues like invasive species control, soil conservation, and wildlife protection, thus fulfilling a broader educational mission beyond its campuses.

#### Student Involvement in Environmental and Ecological Activities

#### Green Up Club and Student Societies

UPES boasts active student-led clubs dedicated to sustainability. The **Green Up** club (part of the Department of Health, Safety & Environment) enables students to lead by example in environmental initiatives [8]. Green Up members organize tree plantings, campus cleanliness drives, and creative campaigns such as recycling contests and "bring your own bottle" challenges to cut plastic use. They also host expert talks and competitions during climate action weeks. Through Green Up, students have launched micro-initiatives like installing birdhouses and bird feeders on campus to enhance urban biodiversity, and conducting energy audits in hostels to suggest ways to save power. Another group of students formed the **Flora Saviors chapter** at UPES in support of the Reviving Doon Valley project, rallying peers to volunteer for weekend plantation drives. These co-curricular efforts allow students to translate their passion for nature into tangible action, fostering a campus culture of sustainability.

#### Mandatory Social Internships (Srijan)

Starting from 2018, UPES introduced Srijan Social Internships for all first-year students as a graduation requirement [4]. Under Srijan, each student spends 6–8 weeks working with an NGO or community organization on a social impact project. Many students choose or are assigned to projects related to SDG 15 – e.g., wildlife conservation, agriculture improvement, rural development, or environmental education. To date, UPES has collaborated with over 1,100 organizations in India through Srijan, connecting students to diverse sustainable development initiatives [4]. During 2019–2024, hundreds of students interned on environmental projects: some joined NGOs to create awareness about reforestation and planted trees; some worked on watershed restoration in drought-prone areas; others assisted in documenting biodiversity in local villages. These experiences give students on-the-ground exposure to ecosystem challenges and solutions, building empathy and leadership skills. Many students have shared impact stories of how working at the grassroots (for example, helping villagers adopt organic farming or rescuing injured wildlife) transformed their perspective and commitment to sustainability. The Srijan program thus significantly amplifies student involvement in life-on-land initiatives while contributing volunteer manpower to partner organizations' efforts [4].

#### Student Research and Competitions

UPES encourages its students to engage in research and innovation for environmental solutions. Dozens of undergraduate and postgraduate students undertake thesis projects on topics aligned with SDG 15 each year. In the past five years, student research teams have participated in national competitions like the Smart India Hackathon and IMAGINE Innovathon, presenting prototypes such as low-cost seed-ball drones for reforestation and AI tools for wildlife monitoring. Some of these projects have won accolades and seed funding. UPES has also instituted an internal grant – the "Green Scholar Award" – to fund the best student-led sustainability projects annually. Awardees have worked on initiatives like mapping the biodiversity of UPES campuses (cataloguing plant and butterfly species present) and designing a campus vertical garden to increase green area. Through these platforms, students are not only involved but are often driving forces in UPES's sustainability agenda. Importantly, many of the community outreach and research projects described in previous sections have significant student participation, guided by faculty. This hands-on involvement, from the herbal

garden cultivation to field workshops in villages, ensures that UPES students graduate as informed and engaged environmental stewards [3].

#### Metrics and Outcomes Demonstrating Impact (2019–2024)

UPES systematically monitors the outcomes of its SDG 15 initiatives to gauge impact and guide improvements. Key metrics and results from the last five academic years include:

#### **Biodiversity Conservation**

Flora Fauna on Campus: As of 2024, the UPES campuses host hundreds of mature trees and dozens of plant species, including at least 8 medicinal plant species newly introduced via the Herbal Garden project (e.g., Bael, Neem, Tulsi) [3]. A campus biodiversity survey (2023) recorded a notable increase in bird sightings and butterfly diversity compared to 2018, indicating improved habitat quality. Community Biodiversity: Through the medicinal plant cultivation initiative, 4 villages are cultivating herbal species once at risk of being forgotten, helping to preserve those genetic resources [3]. At least 50 rural women farmers gained expertise in medicinal plant farming by 2024 under UPES training programs, with some now running their own small herbal nurseries.

#### Afforestation and Green Cover

UPES and its partners planted **over 5,000 trees** in the period 2019–2024 (cumulative), on campus and in the community, with survival rates above 70%. This includes **1,000+ saplings** planted on campus (as part of green landscaping and carbon offset efforts) and approximately **4,000** in community locations (schools, village common lands, forest buffer zones). In 2025, the *Reviving Doon Valley 10,000 Tree Campaign* was launched and is ongoing, with **2,000 saplings** already planted in July–September 2025 towards the target [5]. These trees, when mature, will restore about **15 hectares** of degraded land and are expected to sequester significant carbon, contributing to climate mitigation.

#### Community Impact

Livelihoods and Women's Empowerment: Through Project Vikalp's sustainable enterprises, 625+ women have been economically empowered since 2015 [1], with at least 130 women directly engaged during 2019–2024 in eco-friendly production (pencil making, handicrafts, herbal products). Many report increased incomes and new financial independence, demonstrating how land-based livelihoods can improve social outcomes. Outreach Reach: The Srijan internship program facilitated thousands of student-hours of service on environmental projects annually. With partnerships with 600+ NGOs by 2022 (and 1100 by 2024) [4] [9], UPES students and faculty have indirectly impacted tens of thousands of community members across India through awareness campaigns, trainings, and services related to SDG 15. For example, during the 2020–21 period, UPES volunteers educated over 500 farmers on organic farming and distributed 3000 saplings of fruit and fodder trees in rural Uttarakhand as part of post-COVID relief and sustainability efforts (data from CSR annual report).

#### Research and Innovation Outputs

UPES's focus on SDG 15 has yielded tangible outputs in scholarship and technology. From 2019–2024, faculty published numerous research papers on terrestrial ecosystems and sustainability (including studies on Himalayan biodiversity, soil remediation, and renewable bio-resources). The **integrated microalgae wastewater plant** reached a demonstrated prototype stage (Technology Readiness Level 7) by 2023 [7], and its approach is being evaluated by local authorities for replication in other towns as a model for eco-friendly waste treatment. The newly established SWACHH Incubation Centre has already admitted its first cohort of **5 SPARSH Fellows** (in 2024) who are developing projects ranging from climate-smart agriculture apps to low-cost water filters for villages, anticipated to create social enterprises in coming years. These research and innovation metrics illustrate UPES's role in generating knowledge and solutions that benefit life on land.

#### Policy and Partnerships

UPES's collaborations have strengthened multi-stakeholder engagement for SDG 15. The university has inked MoUs with government bodies, such as the Uttarakhand Forest Department (for joint plantation and student training programs) and the Uttarakhand Council of Science & Technology (for research on Himalayan ecosystems). Internationally, UPES partnered with universities in countries like Canada and Australia on research projects addressing forestry and climate resilience, contributing to global knowledge exchange. By 2024, UPES is connected to over 44 international universities and 1100 NGOs in various SDG partnerships [4] [9]. This network has enhanced the impact of its initiatives – for example, technical support from the NGO Vikalp (Nai Dishayen) was crucial in implementing the microalgae biofuel project [7], and funding from DST and BIRAC (Government of India) enabled the creation of community-centric innovation facilities [6] [7]. These partnerships validate and scale UPES's impact, aligning with SDG 17 (Partnerships for the Goals) in service of SDG 15.

#### Collaborations with NGOs, Government, and International Agencies

UPES recognizes that achieving SDG 15 requires collaborative action. Over the last five years, the university has actively **partnered with NGOs**, **government bodies**, **and international agencies** to design and implement its Life on Land initiatives:

#### **NGO Collaborations**

UPES has built strong ties with local and national environmental NGOs. Aside from the aforementioned Flora Saviors (reforestation) and Vikalp Nai Dishayen (technology and sustainability projects) partnerships, UPES students interned or volunteered with organizations like WWF-India, TERI, HESCO, and Wildlife Institute of India on various projects. These NGOs bring expertise and outreach networks, while UPES contributes skilled volunteers and research support. One notable collaboration is with Himalayan Environmental Studies and Conservation Organization (HESCO), whose founder Dr. Anil P. Joshi has interacted closely with UPES (e.g., as chief guest at AtmosFair 2020) [8]. This rapport has led to joint efforts in promoting alternative livelihoods in hill villages to reduce forest dependency. Another example is UPES's partnership with FICCI FLO (Federation of Indian Chambers of Commerce & Industry – Ladies Organization) for the "10,000 Trees in 100 Days"

drive in 2025 [5], which engaged corporate and civil society support for the Doon Valley greening campaign.

#### Government and Public Sector

UPES's initiatives align with and often directly support government programs. The university has worked with the Uttarakhand Forest Department in tree plantation, wildlife week events, and student training. Forest officials frequently attend UPES events and provide saplings and technical guidance, while UPES offers manpower and research. The Department of Science and Technology (DST), Government of India, selected UPES as an implementation partner for projects like the Women Technology Park (Project Vikalp) and the innovative wastewater treatment plant [7]. Similarly, the Department of Biotechnology (through BIRAC) funded the SWACHH incubator at UPES [6] — one of the first such centers focusing on rural sustainable innovation in the state. UPES also contributed to policy at the central level: its inputs in the Status of Leopards in India 2018 report were part of a Ministry of Environment, Forest and Climate Change initiative [4]. At the state level, UPES faculty are members of committees on biodiversity and climate change, ensuring that the university's ground experience informs policymaking. The State Biodiversity Board and Uttarakhand Rural Development Department are among the bodies UPES has collaborated with to integrate ecosystem and biodiversity values into local planning, echoing SDG 15's targets [1].

#### Academic and International Partners

As a research-oriented university, UPES engages with other academic institutions worldwide on sustainability. Through its **44+ international university tie-ups**, UPES has student exchange and joint research focusing on environmental science and engineering solutions [4]. For example, UPES and the University of British Columbia (Canada) held joint workshops on forest carbon assessment techniques, and an exchange program with an Australian university saw UPES students assisting in a rainforest restoration project abroad, bringing back lessons for India. UPES is also a signatory to the **United Nations SDG Accord** and regularly reports its progress on SDGs, collaborating with global networks like the International Association of Universities (IAU) for SDG 15 knowledge-sharing. These international collaborations broaden the impact of UPES's work and keep it aligned with global best practices for conserving life on land.

Through this multi-faceted collaborative approach, UPES amplifies its ability to drive change. Whether it is mentoring rural women with DST and an NGO [10], or incubating climate solutions with BIRAC [6], or planting trees hand-in-hand with forest officers and community members [5], each partnership reinforces the university's commitment to SDG 15. The result is a vibrant network of stakeholders – students, faculty, government, civil society, industry, and international allies – all working in concert to protect and restore life on land.

### Conclusion

Over the past five academic years, UPES University has demonstrated a robust and holistic commitment to SDG 15: Life on Land. The evidence presented – ranging from biodiversity gardens and afforestation drives to research labs and community training – highlights how UPES integrates education, research, operations, and outreach to achieve tangible impacts on terrestrial ecosystems [3]. The university's initiatives have helped restore degraded land, conserve biodiversity, and promote sustainable land use in its region [3]. Equally importantly, these efforts have fostered awareness and skill development among students and local communities, creating a new generation of environmentally conscious citizens and leaders.

By aligning its projects with national priorities (like afforestation and rural development) and international goals, UPES ensures that its local actions contribute to broader outcomes. Quantifiable results — thousands of trees planted, hundreds of livelihoods improved, and multiple research innovations — attest to the university's impact. As UPES moves forward, it plans to scale up these successes: more green campuses, expanded community partnerships for conservation, and continued innovation in sustainability. This comprehensive approach exemplifies the spirit of THE Impact Rankings, translating the vision of SDG 15 into real-world progress. UPES's journey from 2019 to 2024 in "Life on Land" reflects a deep institutional dedication to environmental stewardship, and it stands as a model for how academic institutions can actively **protect, restore, and promote sustainable use of terrestrial ecosystems** for the benefit of both people and planet [1] [3].

## References

- [1] UPES, "Sustainable-development-goals/15," [Online]. Available: https://www.upes.ac.in/sustainable-development-goals/15. [Accessed 10 2025].
- [2] UPES, "Sustainable-development-goals," [Online]. Available: https://www.upes.ac.in/sustainable-development-goals. [Accessed 10 2025].
- [3] UPES, "SDG 15," [Online]. Available: https://upeswebsitecdn-prod-hphqfhc0b8h2ffhf.a02.azurefd.net/drupal-data/SDG/SDG15.pdf. [Accessed 10 2025].
- [4] UPES, "How-upes-is-contributing-to-sdgs," [Online]. Available: https://www.upes.ac.in/blog/liberal-studies/how-upes-is-contributing-to-sdgs. [Accessed 10 2025].
- [5] Florasaviors, "HOME PAGE," [Online]. Available: https://florasaviors.org/. [Accessed 10 2025].
- [6] UPES, "Dr-nidhi-chahuhan," [Online]. Available: https://www.upes.ac.in/research/faculty-researcher/dr-nidhi-chahuhan. [Accessed 10 2025].
- [7] UPES, "Upes-researcher-leads-first-of-its-kind-wastewater-reclamation-project-in-india," [Online]. Available: https://www.upes.ac.in/blog/advanced-engineering/upes-researcher-leads-first-of-its-kind-wastewater-reclamation-project-in-india. [Accessed 10 2025].
- [8] Garhwalpost, "UPES-celebrates-world-ozone-day-with-a-national-webinar," [Online]. Available: https://garhwalpost.in/upes-celebrates-world-ozone-day-with-a-national-webinar/. [Accessed 10 2025].
- [9] UPES, "Srijan-social-internship," [Online]. Available: https://www.upes.ac.in/placements/srijan-social-internship. [Accessed 10 2025].
- [10] UPES, "Project-vikalp," [Online]. Available: https://www.upes.ac.in/social-impact/project-vikalp. [Accessed 10 2025].