



## **CIU SUSTAINABILITY**

# TIMELINE

## **CENTRE OF EXCELLENCE**

- Centre of Excellence was the office established in 2009 to begin the
- sustainable development of the campus.

#### **PHOTOVOLTAIC POWER** PLANT PROJECT

- Photovoltaic Plant
- Project is commissioned in 2015 to
- develop a peak power of 1.3 MW in order to
- provide sustainable
- energy to the
- whole campus.

- **ENERGY**
- AND

. . .

- WATER
- SOURCE
- MONITORING
- The Science and
- Technology
- Building is a unique project.
- It is the only
- building equipped
- with applied
- energy
- conservation
- measures in the
  - region.

2009

2015

2019











2011

2016

#### SUSTAINABLE ENERGY RESEARCH CENTRE

Sustainable Energy Research Center was created in 2011 to deal with campus sustainability issues.

## **SCIENCE AND** TECHNOLOGY . BUILDING

- The Science and Technology Building is a unique project. It is the only building equipped with applied energy conservation
- measures in the region.

## **CIU SUSTAINABILITY**

## TIMELINE

## BIOGAS PROJECT

- Pre-engineering study of
- 1MW Biogas Plant has
- been completed and local permissions were
- obtained, Installation is
- planned to end in 2025.

## **BIOGAS** CONSTRUCTION

- The construction of the
- biogas project started
- this year and put CIU
- one step closer to being
- a net zero carbon
  - campus.

2021

2024









2020

2022

## **ENERGY AUDIT OF EDUCATIONAL BUILDINGS** & SUSTAINABILITY POLICY

- **Energy Audit of educational**
- buildings such as EHB was
- carried out to determine the areas that are open for
- energy efficiency and savings
- across the campus.
- Additionally, sustainability policy for the campus was
- created.

- FREE DRINKING **WATER & COMMUNITY GARDEN**
- Free drinking water project was realized
- where 35 fountains
- were placed across
- the campus.
- Additionally, a
- community garden
- where students can
- grow their own plants
- was established.

## Smart Building Implementation

The goal is to provide clean and affordable energy to the whole campus.

## %75

75 % of the buildings are equipped with energy monitoring and management systems, allowing us to record energy consumptions of each building and have energy supply management.

## %63

63 % of the buildings are equipped with water management systems like monitoring systems (Flow meters). Additionally, rainwater collection systems are used for flushing and irrigation.

## %100

All buildings are equipped to control the indoor environment such as air quality, thermal comfort and passive cooling methods.

## %50

50 % of all buildings in the campus are implemented with automation systems in order to improve energy efficiency such as HVAC Systems, Central Vacuum Systems, Central Heating Systems etc.

## %100

All buildings in the campus are equipped with smart lighting systems such as sensors, solar shading and highly efficient LED lighting.



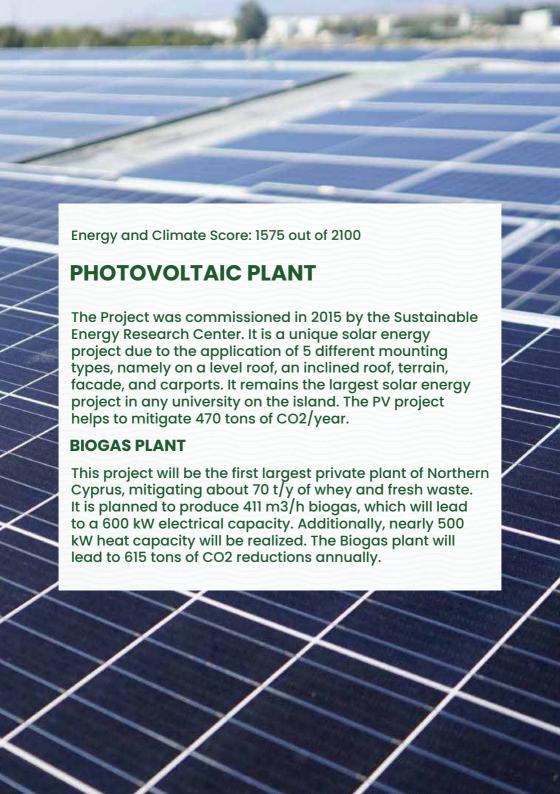
## **ENERGY AND CLIMATE**

## **Indicators**

- Energy Efficient Applications
- Smart Building Program Implementation
- Number of renewable energy sources in campus
- The total electricity usage divided by total campus population
- The ratio of renewable energy production towards total energy usage per year
- Elements of green building implementation
- Greenhouse gas emissions reduction program
- The ratio of total carbon footprint divided by campus population

UI GreenMetric World Sustainable University Ranking: 240th, Turkey: 20th, Cyprus: 1st







### %100 DOUBLE GLAZING

All the buildings on the campus are equipped with double glazing windows, and according to the new energy policy on campus, any renovation or maintenance should also adopt to this type of window.

## **%80 HIGH-EFFICIENT EQUIPMENT**

The Cyprus International University has a strict policy in relation to using high-efficient electrical equipment, such as Energy Star label or with A+ and A++ energy consumption standards.

## %70 VRF SYSTEM

The Science and Technology, Çevik Uraz, CIU Sports Arena Complex, Student Services Center, Soli Apartment, Rectorate building, International Center and Student Union, alltogether cover a total area of 60,000 m2 and are equipped with a high-efficiency VRF system.

#### % 52 THERMAL INSULATION

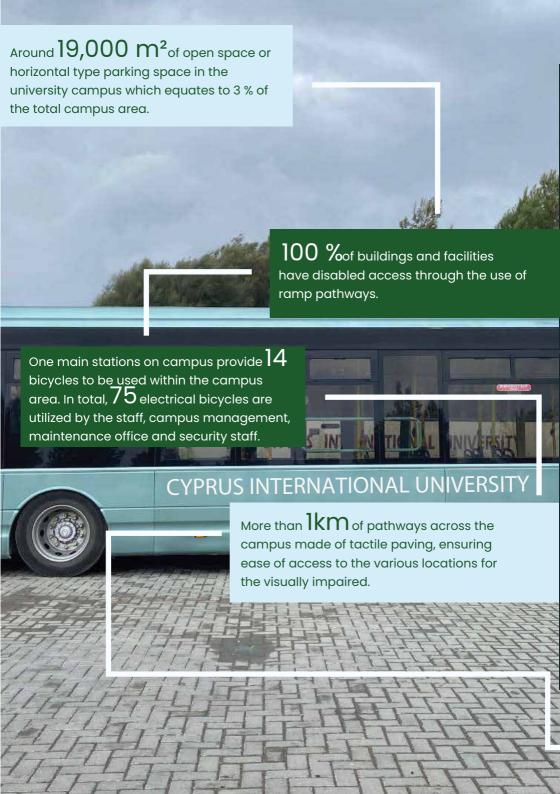
The roofs of more than 52% of the total buildings oncampus (Academic Zone), are equipped with thermal insulation. With the new project in place, it is projected that this number will be 75% by the end of 2025.

#### % 60 NATURAL LIGHTING

More than half of the buildings in the campus are designed with maximum natural day-lighting allowance to decrease consumption of electricity for illumination.

#### %100 ENERGY MONITORING

All the buildings in the campus are equipped with energy (Electricity & LPG) meters to record energy consumptions of each building and energy supply management.



## **TRANSPORTATION**

UI GreenMetric World Sustainable University Ranking:131st, Turkey: 9th, Cyprus:1st

#### Indicators

- The ratio of total vehicles divided by total campus population
- · Shuttle services
- · Zero emission vehicles policy on campus
- The ratio of zerio emission vehicles divided by total campus population
- Transportation program, designed to limit/decrease the parking area on campus for the last 3 years
- Number of transportation initiatives to decrease private vehicles on campus
- Pedestrian policy on campus

## Shuttle and Stops

25 Shuttles operate on the weekdays and total of 10 disabled friendly access and ports provided across the busses.

On average, 5,000 students use the campus buses daily.

CIU campus buses provides free trips every 2 hours during the day and intermittent free trips during the night.

Every 10 minutes, minibuses transfer students from the city center to the campus.

The Transportation Unit of the Cyprus International University offers free shuttle services to students and staff. The university owns 25 vehicles of varying sizes to fulfil its commitments to its students and staff alike, providing free transportation between the CIU campus and Nicosia daily between the hours of 07:00 and 19:45. The Famagusta shuttle services operate in the morning and evenings on weekdays only. The Transportation Unit also provides shuttle services on Saturdays to Kyrenia, departing at 14:00 from CIU and returning at 19:45 from Kyrenia.

## **WATER**

UI GreenMetric World Sustainable University Ranking: 20th, Turkey: 1st Cyprus: 1st

## **Indicators**

- Water conservation program
- Water recycling program
- The use of water efficient appliances
- Piped water consumed CIU is equipped with Drip irrigation for more than 100,000 m² of forest

land and high trees, and around 150,000 m<sup>2</sup> of flowers and grass area. All of the green areas are covered by the latest technology underground irrigation piping, equipped with the drip irrigation system.

CIU lake has a capacity to store 800m3 of water.However, this amount is only collected by rain.



## Fresh Water

70,000 liters of municipal water daily is treated to provide free drinking water through 35 fountains around the campus.

Additionally, CIU has two underground water reserves with capacities of more than 650,000 liters (650 m³) on the east side and 80,000 liters (80 m³) underground water storage for the west side of campus.

One of the most important factors in maintaining the water management system is the monitoring issue. The CIU Sustainable Campus Office has completed a large project in applying water flow meters for all the campus buildings individually in 2019.

Additionally, 100% of the water consumed and used in the campus gets recycled through the university water treatment plant and is used in irregation, therefore no additional water is required for landscape maintanance.

## Cyprus International University Water Treatment System





## SETTING AND INFRASTRUCTURE

UI GreenMetric World Sustainable University Ranking: 65th, Turkey: 10th Cyprus:1st

## **Indicators**

- The ratio of open space area towards total area
- Area on campus covered in forest
- Area on campus covered in planted vegetation
- · Area of campus for water absorbance
- The ratio of open spaces area divided by campus population
- University budget for sustainability effort

Around 197,000 m² of the campus is covered with plant vegetations (including lawns, gardens, green roofs and internal planting), reaching almost 24 % of the total campus area. 23,000 m<sup>2</sup>



203,800 m² area, equaling to 32 % of CIU's campus, is non-retentive surfaces (e.g. earth, grass, concrete block, etc.) for water absorption.

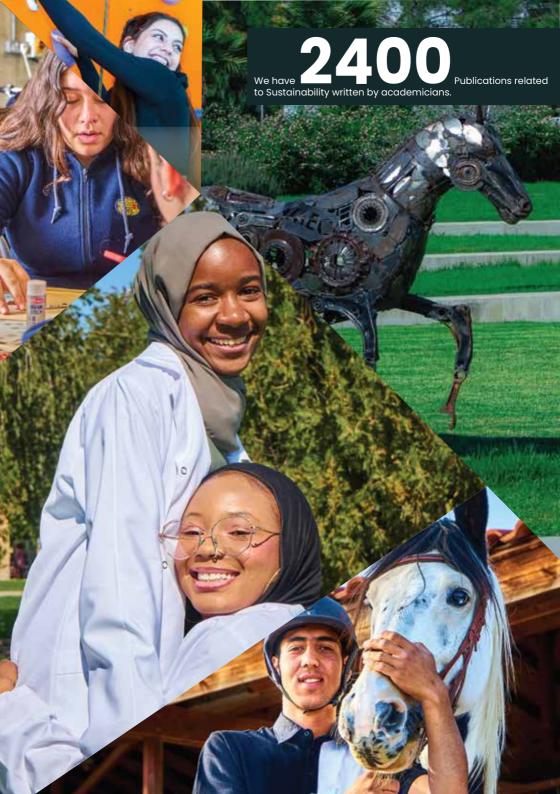
30,000 m<sup>2</sup>
of different
varieties of trees

100% of the campus buildings are equiped with access and equipment for disabled. Additionally, the campus is monitored 24/7 with the security team and open for health inspections through the health infrastructure.

1,200 m<sup>2</sup>

More than  $103,\!000\,m^2$  of CIU is covered by forest, tall green plants and trees. The total forest area amounts to





Education Score: 1675 out of 1800

## **EDUCATION**

UI GreenMetric World Sustainable University Ranking:164th, Turkey:10th Cyprus:1st

#### Indicators

- The ratio of sustainability courses towards total courses/modules
- The ratio of sustainability research funding towards total research funding
- Sustainability publications
- · Sustainability events
- · Sustainability student organizations
- Sustainability website
- Sustainability report

1200

Publications related to Sustainability are cited on Google Scholar in the last 3 years. 96

events in 2024-2025 were held (e.g. conferences, workshops, awareness raising, practical training, etc.)

1240

courses have been taught during the 2024-2025 Academic year relating to sustainability. 49

members of staff and Graduate Students are working in sustainability organizations.

68

Master and PhD thesis' dedicated to the same subject during the 2024–2025 Academic Year.

**35** 

undergraduate students participating on the Sustainable Campus Project.

## Startup Name: Sustainable Garden

Description: Some local vegetables and intercontinental agricultural plants and seeds were planted in order to produce organic agricultural products on the naturally amended soil within the campus, some of our yields will be spinach, radishes, parsley, celery, broad beans by the Students for Sustainable Campus Project team.

In this agricultural farm, organic waste from plants and animals is utilized to amend the soil to carry out a sustainable farming system.

## Startup Name: Café Nature

Description: This is a zone of the university managed by a combined group of 8 graduate and undergraduate students with the main aim of environmental issues education and the focus on reduction of waste and plastic pollution.

## Startup Name:

## Sustainability Workshop

Description: 7 undergraduate students from various departments are working in the sustainable workshop to educate other students with their innovation for recycling purpose of different materials (cigarette buds, paper, glass etc.)

Waste Score: 1500 out of 1800

## **WASTE**

UI GreenMetric World Sustainable University Ranking:192th, Turkey:17th Cyprus:1st

#### Indicators

- Recycling Program for University Waste
- Program to reduce the use of paper and plastic in campus
- Organic Waste Treatment
- Inorganic Waste Treatment
- Toxic Waste Treatment
- Sewerage Disposal

Cyprus International University uses the Dual Stream Recycling Plan to collect, separate and send recycling material waste to local recycling companies.

The recyclables are sorted as Category 1: paper/cardboard, Category 2: electric waste and Category 3:metals/glass/plastic/toxic/organic

100% of paper waste had been collected by campus management student for sustainable campus (SSC) and delivered to the sustainability workshop. Around 720kg of paper waste was recycled the past year.

In addition to paper waste, more than 60% (300 kg) of cardboard were reused by sustainability workshop.

Clothes Donation: Fabric recycling is with the cooperation of a private company. All second hand clothes collected in the special boxes around of the campus are sent for recycling process to create a budget for cancer patients. 99%

Paper Wastes: is collected by special paper trash bins that are spreaded all over the campus site. The average monthly amount of newspaper and wasted paper collected is about 60 kg. 99% Sustainable innovation center creates a constant program to recycle these papers and make paper recycled pencils. Approximately 5 gr of recycled paper is required to produce a pencil.

Yard Trimming: Campus Management team collects the organic waste (grasses or leaves) around the campus which is nearly 50 kg/day and sends to be recycled or reuses in the university greenhouse as mulch and peat.

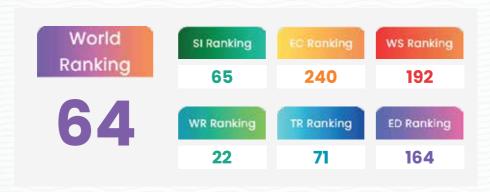
We Are Nature café is not only used as a reflection of the waste management on the campus, but also to educate the students and the public on the adverse effects of harmful materials upon the environment, such as singleuse plastic.

The green design center was founded in 2018 in the public sphere 'We Are Nature Café' and is situated in the middle campus area where students can get together and enjoy a sustainable green environment. This center has had a substantial impact upon the students on the campus with a variety of activities.

This area is designated as a plastic free zone (PFZ) and plans to educate students to reduce the usage of plastic in their day-to-day life.



#### 2. RESULTS SUMMARY



## 3. WORLD RANKINGS HISTORY

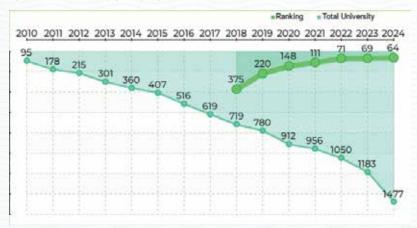


Figure 3.1 World Rankings History Diagram

## 4. RANKING IN TURKİYE



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# Certificate

This certificate is awarded to Cyprus International University

as The 64<sup>th</sup> World's Most Sustainable University in 2024 UI GreenMetric World University Rankings

12 December, 2024



Prof. Dr. Ir. Riri Fitri Sari, M.M., M.Sc. Chairperson of Ul GreenMetric



## www.ciu.edu.tr



