

### **THE - Impact Rankings 2025**



# Ensure access to affordable, reliable, sustainable and modern energy for all

#### SDG 7.2.3 Carbon Reduction and Emission Reduction Process:

The institution follows several programs and initiatives to reduce its environmental impact and support sustainability, helping to reduce carbon emissions both directly and indirectly. These are some of the common programs followed by KARE:

- 1. Usage of the solar energy panels in the campus to produce some of the energy for the campus needed.
- 2. Effective implementation of Rainwater harvesting system
- 3. Explicit policy on Energy
- 4. Usage of Energy Efficient appliances
- 5. Academic programs on Energy and Climate change
- 6. Usage of E-Vehicles for campus shuttle services
- 7. Public transport

#### **Description:**

#### 1. Usage of the renewable energy sources through solar energy panels in the campus

To tap the alternate energy sources, KARE has installed 1124.22kWp rooftop solar power panels on top of nine blocks. About 45% of the energy consumption is met by the solar energy leading to the reduction in carbon foot print. The institution has also installed 152 solar street lights throughout the campus which amounts to a saving of about 9.56 kWh per annum. Further, solar water heaters are installed in the hostels and solar pumps are installed in the agriculture farms to tap solar energy.







Rooftop Solar plant

### 2. Effective implementation of Rainwater harvesting system

Considering the location of the institution, KARE has installed various rain water collection systems to sustainably manage the water requirements in the campus. The rain water collected is either used for recharging the ground water through water harvesting pits and trenches or stored in tanks and used.

The rainwater is harvested from the roof top of the academic buildings and hostels. The water is collected through pipes and the collected water is either used for recharging the ground water or taken through canals to the percolation ponds situated at three locations inside the campus.











Rainwater harvesting system (sample only)

### 3. Explicit policy on Sustainable Goals:

• The Institution has developed comprehensive sustainability plans and policies that include specific carbon footprint reduction targets and strategies. The list of plan and policies are listed below:

### Policy URLs:

S.No	Policies/Plan	URL Link		
1.	Energy Policy	https://kalasalingam.ac.in/wp-content/uploads/2021/11/Energy-Pol		
		pdf		
2. E-Waste Policy <a href="https://kalasalingam.ac.">https://kalasalingam.ac.</a>		https://kalasalingam.ac.in/wp-content/uploads/2021/11/e-waste_policy		
		<u>.pdf</u>		
3.	Maintenance Policy	https://kalasalingam.ac.in/wp-content/uploads/2021/11/Maintenance-P		
		<u>olicy.pdf</u>		
4.	Recycle Policy	https://kalasalingam.ac.in/wp-content/uploads/2021/11/Recycle-Policy		
		<u>.pdf</u>		
5.	Sustainable	https://kalasalingam.ac.in/wp-content/uploads/docs/Sustainable_Envir		
	Environment	onment.pdf		
6.	Water Conservation	https://kalasalingam.ac.in/wp-content/uploads/2021/11/Water-Conserv		
	Policy	ation-Policy.pdf		

#### 4. Academic programs:

To ensure the success of its energy efficiency initiative, the institute offers various programs on energy and climate change. These programs aim to raise awareness among the student community.



M.Tech programme on Renewable Energy Technologies

URL: https://kalasalingam.ac.in/course/m-tech-renewable-energy-technologies/

• Program Elective courses: B.Tech., EEE Curriculum and syllabi

S.No	Course Code	Course Name	Dept
1.	213EEE3132	Solar Photovoltaic Systems	EEE
2.	213EEE3133	Wind Power Generation	EEE
3.	213EEE3134	Biomass Energy System	EEE
	213EEE3135	Geothermal and Ocean Energy Conversion	EEE
4.	213EEE3136	Industrial & Commercial Aspects of Renewable Energy	EEE
		Sources	
5.	213EEE2137	Renewable Energy Sources	EEE
6.	213EEE3138	Fuel Cell Technology	EEE
7.	213EEE3139	Smart Grid	EEE
8.	213EEE2150	Solar and Wind Energy Conversion	EEE

- Foundation course on Sustainable development (211MEC1401 Sustainable Design and Manufacturing) that aimed at educating the campus community about the importance of energy conservation:
- **5.** KARE recognizes the importance of climate change and is dedicated to helping reduce greenhouse gas emissions to support nations' goals. KARE has **banned the entry of vehicles** inside the academic arena. This policy encourages walking or biking for short distances within the campus to cut down on fuel use and reduce carbon dioxide emissions.









Entry restriction to Emission vehicles







Pedestrian friendly pathways around the campus

## 6. Campaign on energy saving for reducing of electricity consumption

Office equipment such as computers, printers, and copiers can contribute significantly to energy usage. Sign boards are kept to adopt the following practices to reduce their energy consumption:



Sign Boards placed in classrooms to adopt the practice among the students for Energy consumption



### 7. Transportation Initiatives to reduce Carbon footprint

- Faculty members and students are encouraged to use bicycles inside the campus.
- 78% of students live in campus hostels, so they don't use any vehicles. Because of this, private vehicles are restricted.
- To reduce air pollution and save fuel, 4 battery-powered electric vehicle facility is available in the campus. People can use the shuttle service that is provided with the use of electric vehicles.







Use of EVs and bicycles for campus shuttle services





Under sec. 3 of UGC Act 1956. Accredited by NAAC with "A++" Grade





Bicycles for University staff for campus shuttle services.