

ADHIYAMAAN COLLEGE OF ENGINEERING

(An Autonomous Institution)

[Approved by AICTE, Affiliated to Anna University,

Accredited by NBA (CSE, ECE, EEE, IT, BME, Biotech & MCA) and NAAC with "A" Grade]

Dr. M.G.R. Nagar, HOSUR - 635 130, Krishnagiri (Dist.), Tamil Nadu, India.

Dr.R.Radhakrishnan, M.E., Ph.D.,
Principal

ENERGY CONSERVATION POLICY

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Approved By : Governing Body

1. Introduction

Adhiyamaan College of Engineering (Autonomous) (ACE), Hosur, recognizes that efficient energy management is an essential component of sustainable institutional development. The College is committed to reducing energy consumption, improving energy efficiency, promoting renewable energy adoption and cultivating responsible energy usage among all stakeholders. As an institution dedicated to quality education and environmental stewardship, the College believes that conserving energy not only minimizes operational costs but also contributes significantly to environmental protection and climate change mitigation.

This Energy Conservation Policy provides a comprehensive framework for planning, implementing, monitoring, and continually improving energy management practices across the campus. The policy supports the institution's Green Campus initiatives and aligns with the Sustainable Development Goals (SDGs), National Education Policy (NEP 2020), Energy Conservation Act, 2001, and the quality requirements of NAAC and NBA.

2. Policy Statement

ACE is committed to creating an energy-efficient campus by integrating sustainable technologies, responsible operational practices, and continuous improvement in energy performance. The institution shall make every reasonable effort to optimize energy consumption while ensuring that academic, research, administrative, and student support activities continue without compromise.

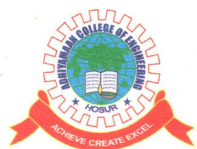
The College shall encourage every member of the institution to actively participate in energy conservation initiatives and shall promote innovation, awareness, and accountability in the efficient utilization of energy resources.

3. Objectives

The primary objectives of this policy are to establish a systematic approach for managing energy resources and to ensure continual improvement in energy performance throughout the institution.

ACE aims to:

- minimize overall electricity consumption across the campus;
- maximize the use of renewable and clean energy sources;
- improve the energy efficiency of buildings, laboratories, and utilities;



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- reduce greenhouse gas emissions associated with campus operations;
- create awareness and develop responsible energy-use behaviour among students and staff;
- integrate energy conservation into teaching, research, and extension activities; and
- establish measurable indicators for monitoring institutional energy performance.

4. Scope

This policy applies to all academic departments, administrative offices, laboratories, workshops, libraries, hostels, common facilities, sports infrastructure, transportation systems, and utility services operated by the institution.

The policy is applicable to all faculty members, students, administrative staff, support staff, contractors, service providers, and visitors entering the campus.

5. Institutional Commitments

The College is committed to adopting energy-efficient technologies and sustainable operational practices in all its activities. Every new infrastructure development, renovation, equipment procurement, and maintenance activity shall consider energy efficiency as one of the important decision-making criteria.

The ACE shall progressively strengthen its energy management practices through the following initiatives:

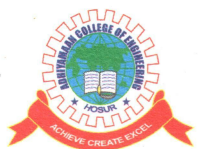
- adoption of energy-efficient electrical equipment;
- installation of LED lighting systems throughout the campus;
- increased utilization of renewable energy technologies such as solar photovoltaic systems;
- replacement of obsolete equipment with energy-efficient alternatives;
- implementation of smart monitoring and metering systems;
- periodic preventive maintenance of electrical installations;
- promotion of natural lighting and ventilation wherever feasible; and
- continual monitoring and evaluation of campus energy consumption.

6. Energy Management Practices

Energy conservation shall become an integral part of the day-to-day functioning of the institution. All departments shall adopt responsible operational practices that reduce unnecessary energy consumption without affecting productivity or academic quality.

To achieve this objective, the institution shall:

- maintain indoor air-conditioning temperatures between 24°C and 26°C;
- ensure that lights, fans, computers, laboratory equipment, and air conditioners are switched off when not in use;



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- maximize the use of daylight during working hours;
- encourage power-saving modes for computers and office equipment;
- install occupancy sensors and timer-controlled lighting in common areas whenever feasible;
- undertake regular preventive maintenance of electrical equipment to minimize energy losses; and
- promote digital communication to reduce dependence on energy-intensive printing activities.

7. Renewable Energy Promotion

Recognizing the importance of clean energy, the institution shall progressively increase the contribution of renewable energy in meeting campus energy requirements. Renewable energy systems shall be expanded based on technical feasibility and financial viability.

The College shall actively explore opportunities for:

- rooftop solar photovoltaic installations;
- solar-powered street lighting;
- solar water heating systems;
- hybrid renewable energy technologies; and
- energy storage solutions for improving reliability and efficiency.

8. Roles and Responsibilities

Successful implementation of this policy requires active participation from every stakeholder. The Management shall provide strategic direction, financial support, and necessary infrastructure for implementing energy conservation initiatives.

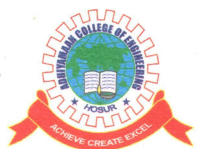
The principal shall oversee policy implementation and ensure that energy management becomes an integral part of institutional governance.

The IQAC and Green Campus Committee shall coordinate energy conservation activities, monitor implementation, conduct periodic reviews, and facilitate annual Green and Energy Audits.

Heads of Departments shall ensure compliance within their respective departments, encourage innovative student projects related to energy conservation, and promote responsible use of electrical facilities.

Faculty members shall educate students on sustainable energy practices and ensure judicious use of laboratories, classrooms, and office equipment.

Students shall actively participate in energy conservation initiatives by using electrical appliances responsibly, reporting energy wastage, and supporting Green Campus programmes.



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9. Energy Monitoring and Audit

ACE shall establish a systematic mechanism for monitoring campus energy consumption. Electrical energy usage shall be periodically recorded, analysed, and reviewed to identify opportunities for improvement.

The institution shall conduct annual Energy Audits through competent agencies or certified auditors. Recommendations emerging from the audit shall be incorporated into institutional planning, and implementation progress shall be reviewed periodically by the Green Campus Committee and IQAC.

Energy performance indicators shall be monitored regularly to ensure continual improvement.

10. Awareness and Capacity Building

The institution believes that lasting improvements in energy conservation can be achieved only through awareness and behavioural change. Accordingly, regular awareness programmes shall be organized for faculty members, students, and staff.

Such initiatives may include:

- National Energy Conservation Day celebrations;
- workshops and expert lectures;
- awareness campaigns;
- student competitions;
- Green Campus activities;
- energy audit projects; and
- faculty development programmes related to sustainable energy.

11. Procurement Policy

The procurement of electrical equipment shall prioritize energy efficiency, life-cycle cost, durability, and environmental sustainability. Preference shall be given to products certified under the Bureau of Energy Efficiency (BEE) star-rating programme or equivalent internationally recognized standards.

Whenever feasible, procurement decisions shall consider total energy consumption over the expected life of the equipment rather than only the initial purchase cost.

12. Performance Indicators

To measure the effectiveness of this policy, the institution shall monitor key performance indicators annually.



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Performance Indicator	Institutional Target
Annual reduction in electricity consumption	Minimum 5%
LED Lighting Coverage	100%
Renewable Energy Contribution	Increased every year
Annual Energy Audit	One per year
Preventive Maintenance Compliance	100%
Energy Awareness Programmes	Minimum Four per Year
Student Participation	Above 70%
Smart Energy Monitoring Coverage	All Major Buildings

13. Policy Review

This policy shall be reviewed once every two years or earlier whenever required due to changes in statutory regulations, technological developments, institutional priorities, or recommendations arising from Energy Audit reports.

The review shall ensure that the policy remains relevant, effective, and aligned with national and international best practices in energy management.

14. Conclusion

ACE reaffirms its commitment to responsible energy management through this Energy Conservation Policy. By integrating energy-efficient technologies, promoting renewable energy, encouraging behavioural change, and continuously monitoring institutional performance, the College aims to create a sustainable campus that serves as a model of environmental responsibility and academic excellence.

The successful implementation of this policy requires collective commitment from the Management, faculty, staff, students, and all stakeholders. Through shared responsibility and continual improvement, the institution seeks to reduce its environmental footprint while supporting national goals for sustainable development and energy security.

Prepared by IQAC


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