



SES COLLEGE

SREEKANDAPURAM
EDUCATIONAL
SOCIETY

Affiliated to **Kannur University**
Accredited by **NAAC at 'B' Grade**

SREEKANDAPURAM POST,
KANNUR DISTRICT,
KERALA, PIN:670631
PH: 0460 2230293, 2231145



S.E.S. COLLEGE

www.sescollege.ac.in • sescollege.skprm@gmail.com • principal.sescollege@gmail.com

Criterion 7 - Institutional Values and Best Practices

7.1 Institutional Values and Social Responsibilities

7.1.6 Quality audits on environment and energy are regularly undertaken by the institution



Dr. DOMINIC THOMAS
Principal
S.E.S. COLLEGE
SREEKANDAPURAM

Department of Physics

SES COLLEGE SREEKANDAPURAM



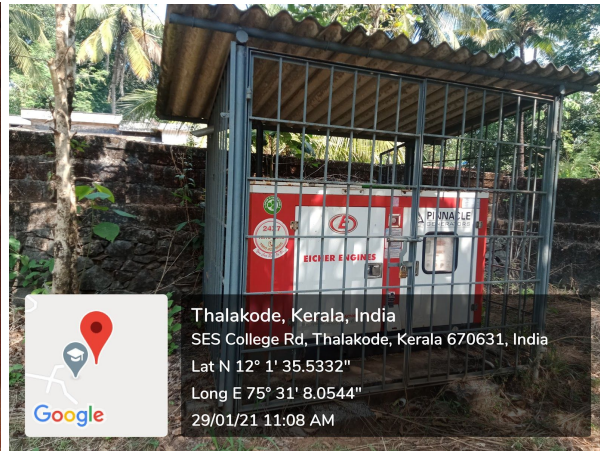
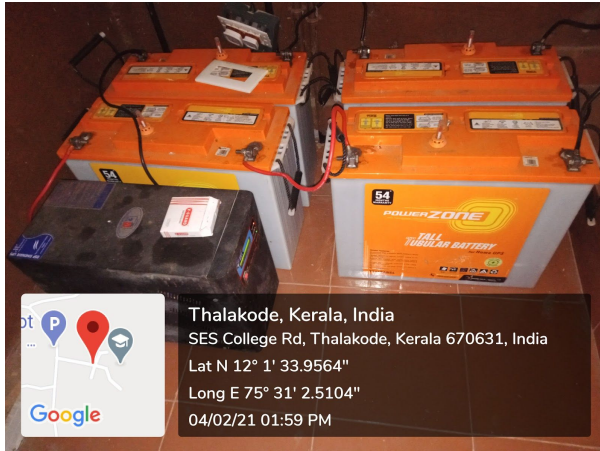
Energy Auditing

An energy audit was done by physics department of our college. The total energy consumption of the campus, renewable energy use, energy saving methods were documented. A proposal was also made as to how much energy we can save if the replace fluorescent tubes by LED tubes, older fans by star rating new fans.

Total power required in one month	: 3096kwh
Total annual power required	: $3096 \times 12 = 37182$ kwh
Total power obtained from renewable from energy (Solar) per month	: 480kwh
Total solar power for one year	: $480 \times 12 = 5760$ kwh
Percentage of annual power requirement by Solar energy	: $5760 / 37186 = 6.54\%$
Total number of LED tubes	: 10
Power consumed perYear by LED	: $10 \times 20 \times 3 \times 30 \times 12 = 216$ kwh
Number of fluorescent tubes	: 150
Annual power met through fluorescent tubes	: $150 \times 40 \times 3 \times 30 \times 12 = 6480$ kwh
Annual lighting power requirement	: $6480 + 216 = 6696$ kwh
Percentage of Annual lighting power requirement	

Met through LED

: $216/6480 = 3.3\%$



Energy sensitive moves for campus

College has installed solar panel of 8kwh capacity, cleaned every week and other kind of maintenance is provided by service providers.

We planned to make campaign in college campus on careful usage of electric power, so as to avoid the unnecessary working of electrical items and equipments, means switch on them only if needed, switch of as need is over.



Recommendation to the college management

We put some suggestions to the college management in order to save the electric power and increase the efficiency, replace older fans, tubes, motor and other electrical equipments by new 'star rating' one. Which will save energy up to 50%. It is advisable to install more solar panels so as to increase the quantity of the renewable energy.

Conclusion

Energy saved is equal to energy produced, so by saving each unit of current we can produce current.

