

SCHOOL OF CLIMATE CHANGE

AAETI



A GSP Solar 30 workshop for teachers from Himachal Pradesh

UNDERSTANDING AND USING RENEWABLE ENERGY IN A CLIMATE-STRESSED WORLD

OCTOBER 9-11, 2022

**Anil Agarwal Environment Training Institute
(AAETI), Nimli, Rajasthan**

ENERGY EFFICIENCY IN CLASSROOMS

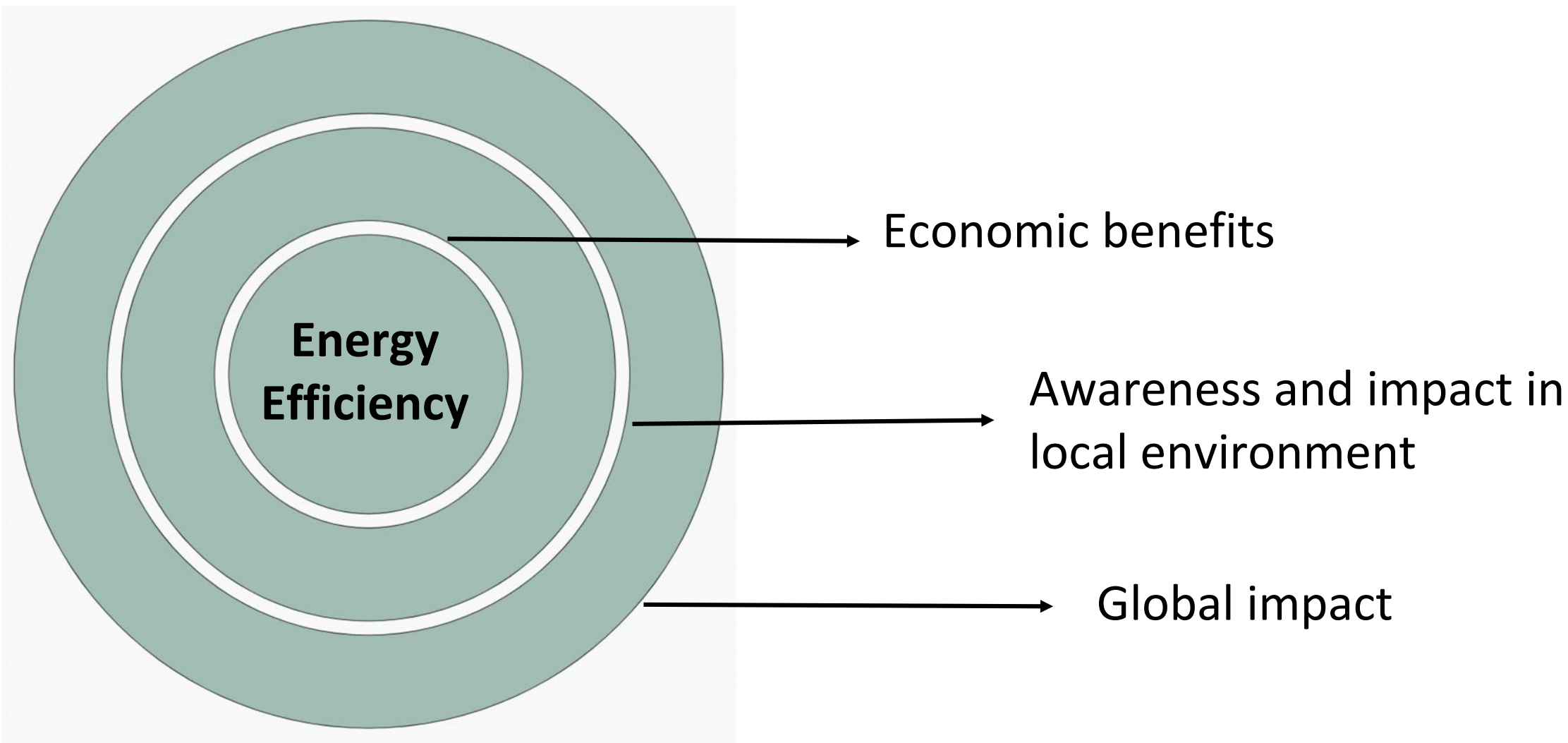


ENERGY IS EVERYWHERE!

From the gadget in our hands
that uses some of the rarest minerals
to the thing we are taking down our notes with...



Why Talk About Energy Efficiency?



Sustainable Development Goals



Energy and Climate Change

- **More than 60%** of India's energy demands are met by **fossil fuels**
- **40% of global CO₂ emissions** that heat up the Earth are **from power industry**
- In turn, **warmer temperatures increase energy demand** and consumption goes high
- 23% of global anthropogenic CO₂ emissions come from **transportation**
- **Burning of gasoline and diesel** releases particulate matter and greenhouse gases that cause air pollution AND warm the planet

CLIMATE CHANGE

Half the national curricula worldwide don't mention climate change, most teachers unsure of explaining subject: UNESCO

Thirty six per cent of the respondents did not include environmental themes in any teachers' training

Finding #1

ALTHOUGH 92 PER CENT OF THE ANALYSED POLICY AND CURRICULUM DOCUMENTS INCLUDED AT LEAST ONE REFERENCE TO ENVIRONMENTAL THEMES, THE DEPTH OF INCLUSION WAS VERY LOW ON AVERAGE.

Finding #3

NATIONAL CURRICULUM FRAMEWORKS HAVE SUBSTANTIALLY MORE REFERENCES TO ENVIRONMENT-RELATED TOPICS THAN EDUCATION SECTOR PLANS.

Finding #2

THERE WAS MUCH GREATER FOCUS ON 'ENVIRONMENT' THAN ON 'CLIMATE CHANGE' OR 'BIODIVERSITY', WITH 83 PER CENT OF THE DOCUMENTS ANALYSED MENTIONING 'ENVIRONMENT' AT LEAST ONCE AND 69 PER CENT MENTIONING 'SUSTAINABILITY', WHEREAS 'CLIMATE CHANGE' AND 'BIODIVERSITY' WERE MENTIONED IN ONLY 47 PER CENT AND 19 PER CENT OF DOCUMENTS RESPECTIVELY.

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Finding #8

OVER A THIRD OF SURVEY RESPONDENTS INDICATED NO INCLUSION OF ENVIRONMENT-RELATED CONTENT IN TEACHER TRAINING PROGRAMMES.

Finding #10

THE SUBJECTS VIEWED AS MOST LIKELY TO INCLUDE ENVIRONMENT-RELATED CONTENT WERE BIOLOGY, SCIENCE, AND GEOGRAPHY; THE PERCEPTION OF INCLUSION IN ALL SUBJECTS WAS QUITE LOW.

Finding #9

THERE IS HIGHER INCLUSION OF ENVIRONMENTAL ACTIVITIES IN UPPER SECONDARY EDUCATION (IN CONTRAST TO PRIMARY AND LOWER SECONDARY EDUCATION), APART FROM NATURE-BASED INSTRUCTION AND GARDENING, WHICH WERE VIEWED AS PREVALENT IN LOWER GRADE LEVELS, AMONGST THE SURVEYED EDUCATION STAKEHOLDERS.

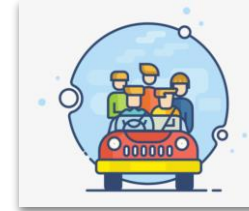
Becoming Energy Efficient: Practices



Use natural light as far as possible



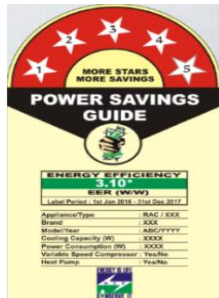
Replace incandescent and even CFL lighting with LEDs



Carpool



Take public transport



Use BEE star-rated appliances



Turn off appliances when not in use

Becoming Energy Efficient: Practices



Ensure vehicle fitness



Invest in solar lights and
other solar-powered
equipment



Walk or ride bicycle as far
as possible



Eat locally-sourced
food

Becoming Energy Efficient: Classroom Lessons

- Measure, change, improve, measure
<https://www.lifestylecalculator.com/unfccc>
<https://www.footprintcalculator.org/home/en>
- Learning tools: electricity bill
- Extending textbook lessons to the field
- Hands-on learning for students: resource material, RE projects