



RENEWABLE ENERGY PROJECT

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OVERVIEW

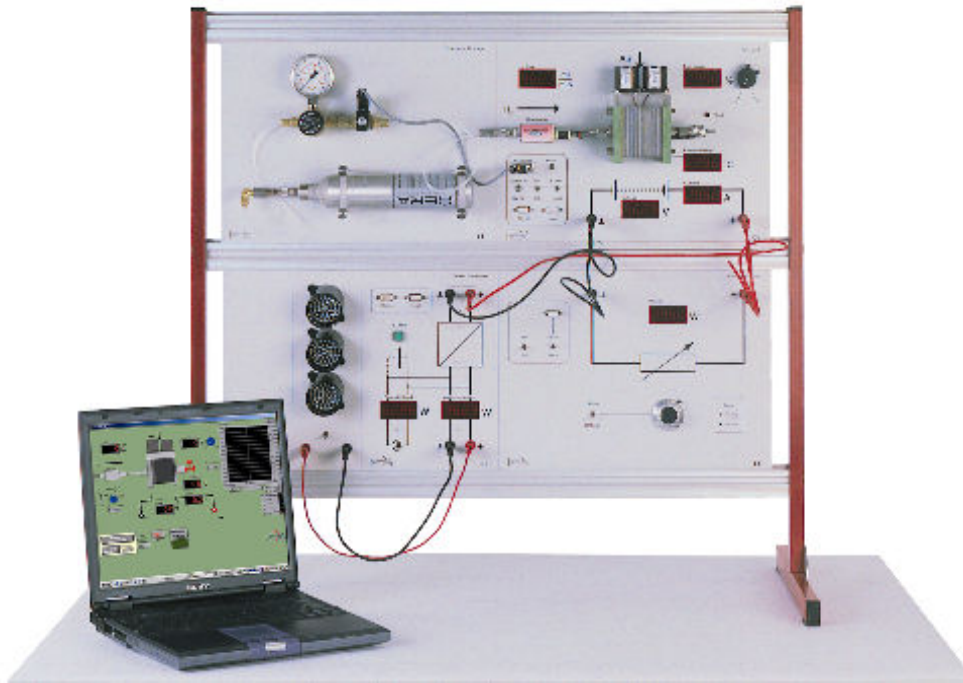
- CRITICAL ISSUE: Environmental friendly energy alternative
- Oil transportation and use cause problems



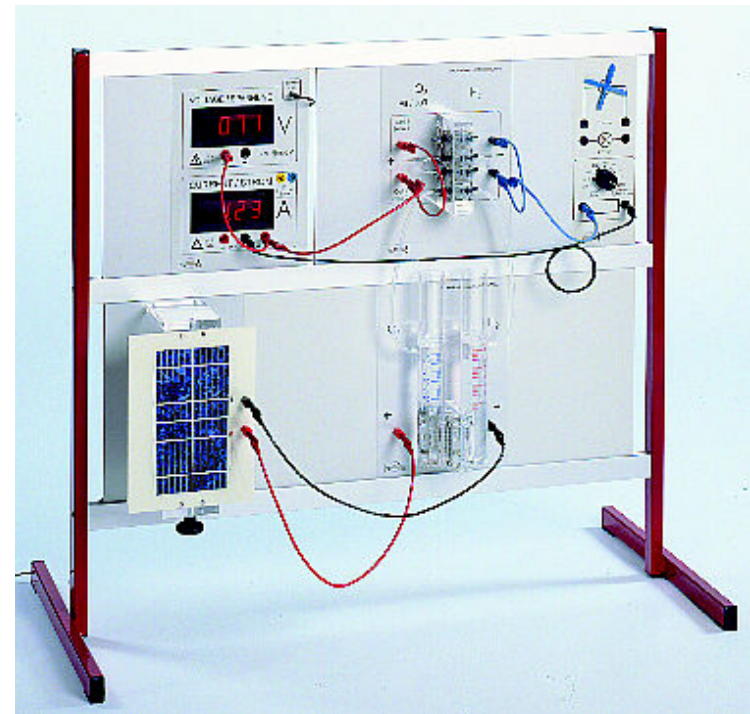
PROCEDURE

- Renewable energy technology related lectures
- Experiments following up.
- Relevant information on nanotechnology related to energy

Experimental Setup-HFC



Proton Exchange Membrane (PEM) hydrogen fuel cell

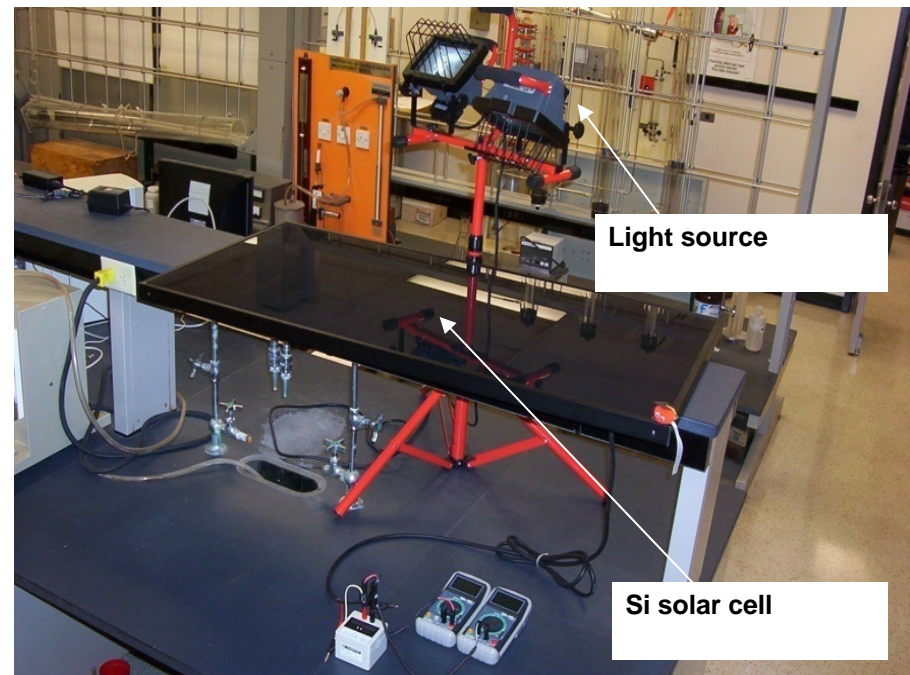


Hydro-Genius Professional System

Experimental Setup-DMFC and Si Solar Cell



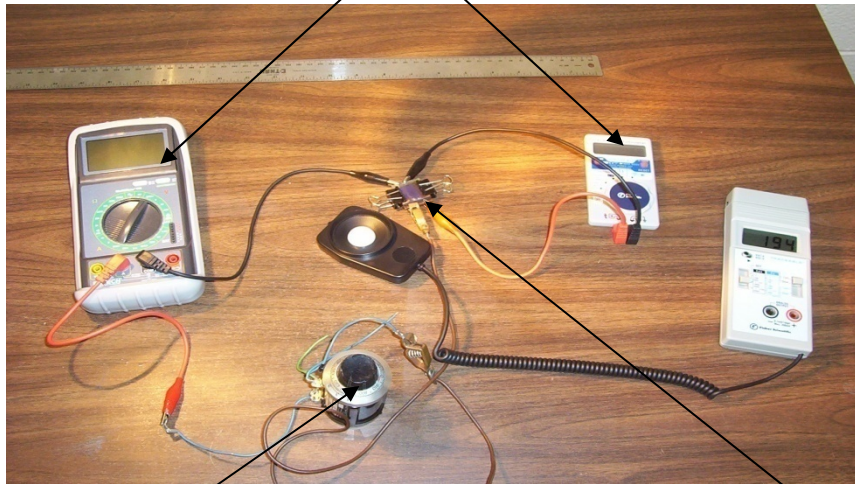
Direct Methanol Fuel Cell



Silicon Solar Cell

Experimental Setup-Dye Sensitized Solar Cell

Multi-electrometers



TiO₂ Solar cell

Variable resistor/load



Dye Sensitized Solar Cell Kit
(DSSC1001)

Nanocrystalline Solar Cell



OUTCOME

- Both theoretical and experimental knowledge in environmentally friendly approaches for power generation
- Useful information and techniques that could be taken into teaching