

**МІНІСТЕРСТВО ОСВІТИ І НАУКИ УКРАЇНИ
СУМСЬКИЙ ДЕРЖАВНИЙ УНІВЕРСИТЕТ
КАФЕДРА ІНОЗЕМНИХ МОВ
ЛІНГВІСТИЧНИЙ НАВЧАЛЬНО-МЕТОДИЧНИЙ ЦЕНТР**

**МАТЕРІАЛИ
VIII МІЖВУЗІВСЬКОЇ НАУКОВО-ПРАКТИЧНОЇ
КОНФЕРЕНЦІЇ
ЛІНГВІСТИЧНОГО НАВЧАЛЬНО-МЕТОДИЧНОГО ЦЕНТРУ
КАФЕДРИ ІНОЗЕМНИХ МОВ**

“TO LIVE IN A SAFER WORLD”

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ALTERNATIVE ENERGY SOURCES

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Energy sources are very important for all of us. We all need different types of energy in our daily life to perform different tasks. We get energy from different natural resources like coal, petroleum, and electricity. Again, electricity comes from different sources hydro-electricity, thermal electricity and some alternate sources of energy like electricity from solar energy. Alarming Situation of Natural energy sources Stock Natural sources of energy are limited because of their limited stock. It takes several years in formation of natural energy sources but if the consumption of energy sources will be too more (like in current situation) than the rate of their formation, they will not last longer. Even the stocks of energy sources like petroleum are limited to certain areas and they have monopoly on petroleum market, resulting drastic increase in rates of petroleum during last decade.

Every day, the world produces carbon dioxide that is released to the earth's atmosphere and which will still be there in one hundred years time.

This increased content of Carbon Dioxide increases the warmth of our planet and is the main cause of the so called "Global Warming Effect". One answer to global warming is to replace and retrofit current technologies with alternatives that have comparable or better performance, but do not emit carbon dioxide.

We call this Alternate energy.

By 2050, one-third of the world's energy will need to come from solar, wind, and other renewable resources. Who says? British Petroleum and Royal Dutch Shell, two of the world's largest oil companies. Climate change, population growth, and fossil fuel depletion mean that renewables will need to play a bigger role in the future than they do today.

Alternative energy refers to energy sources that have no undesired consequences such for example fossil fuels or nuclear energy. Alternative energy sources are renewable and are thought to

be "free" energy sources. They all have lower carbon emissions, compared to conventional energy sources. These include Biomass Energy, Wind Energy, Solar Energy, Geothermal Energy, Hydroelectric Energy sources. Combined with the use of recycling, the use of clean alternative energies such as the home use of solar power systems will help ensure man's survival into the 21st century and beyond.

From an environmental perspective, solar power is the best thing going. A 1.5 kilowatt PV system will keep more than 110,000 pounds of carbon dioxide, the chief greenhouse gas, out of the atmosphere over the next 25 years. The same solar system will also prevent the need to burn 60,000 pounds of coal. With solar, there's no acid rain, no urban smog, no pollution of any kind.

Societies have taken advantage of wind power for thousands of years. The first known use was in 5000 BC when people used sails to navigate the Nile River. Persians had already been using windmills for 400 years by 900 AD in order to pump water and grind grain. Windmills may have even been developed in China before 1 AD, but the earliest written documentation comes from 1219. Cretans were using "literally hundreds of sail-rotor windmills [to] pump water for crops and livestock."

As the primary source of biofuels in North America, many organizations are conducting research in the area of ethanol production. On the Federal level, the USDA conducts a large amount of research regarding ethanol production in the United States. Much of this research is targeted toward the effect of ethanol production on domestic food markets.

Since the late 1980s, there have been several attempts to investigate the possibility of harvesting energy from lightning. It has been proposed that the energy contained in lightning be used to generate hydrogen from water, or to harness the energy from rapid heating of water due to lightning, or to use inductors spaced far enough away so that a safe fraction of the energy might be captured. In the summer of 2007, an alternative energy company called Alternate Energy Holdings, Inc. (AEHI) unsuccessfully tested a method for capturing the energy in lightning bolts.