

# [Alternative energy sources should develop environmental sciences essay](https://assignbuster.com/alternative-energy-sources-should-develop-environmental-sciences-essay/)

Phaneendra. MadalaFairleigh Dickinson UniversityAbstractThe electricity sector in British Columbia has played a significant role in the economic life of the country. BC has several resources to produce energy mainly the energy is produced from Hydro, Biomass, Natural gas and Diesel. BC Hydro is the main electric distributor, serving 1. 8 million customersin most areas. Thisarea should develop renewableenergy as priorityin future. Renewable energy has the promise to become the energy power house of the 21stcentury. Renewable energy can create jobs and new industries, and improve air and water quality, energy security, access to energy, and community development. Meeting our future power demands is one of the first opportunities for rapid deployment of renewable energyRenewable energyBritish Columbia can reduce ambitious greenhouse gas by using renewable energy sources . There are several types of renewable sources of energies to generate clean energy. BC can generate renewable energy by water, solar, wind, wave, ocean, bio gas and bio mass . these can generate energy without having any pollutants but to establish these industries , The capital cost is more. However British Columbia has different sources to generate energy from natural gas, crude oil, hydropower, biomass, wind and coal. Solar energyAmong these energies solar energy is not suitable for BC environment, Because there are so may wind energy projects and they will produce power for 10-12 cents kWh, compared to 50-80 cents for solar, due to the weather conditions in B. C there is no continuous generation of solar power. Hydro-Electric Energy: British Columbia government has providing power to the province up to 86% of to power . The Mica, Revelsotoke, W. A. C. Bennett, These rivers are the main source of energy to the state, Dams which are located in BC are generating energy of nearly 11, 000MW, which is sufficient to provide electric to half of the state .#3 Canada ranksin Global large hydro power productionGovernment should improve the process of generating power from water. At present Electric department is using only one kind of method to produce power from hydro. CONVENTIONAL STORAGE FACILITIES (schematic of a turbine)In this process potential energy plays major role, reserving rain water through building dams in between the rivers and when water touch downs the higher end in scale of reservoir, releasing water from certain height towards turbines which are fixed in lower level of dam gates. Generators are attached to the turbine by fixing shaft to them, which contains series of magnets that spin and move past copper coil forcing the movement of electrons creating the electricity. When water comes from dam with more potential helps to rotate the turbines in high speed. In this process power will be generated and stored in the huge capacitors. Renewable; Bring more turbines to work in small size with high quantity of turbines . Increase the capacity of generator which are fixed inside the turbineMethods to renewable the power generatingprocess; This method is called RUN OF RIVER: Government should implement this plan for the production of more hydro power to state in the future. By arranging turbines on the river banks in the place where water travels with more speed that which helps the turbines to rotate more and generating more power to the province . Example: By arranging more turbines in the Niagara falls on the top of it where water falls from the top , In the same way arranging few more turbines in the place where water falls from certain height . WIND ENERGY: Government should concentrate on wind energy because BC have huge mountains in the north side of the state, by arranging wind turbines on the mountain. Already B. C is generating 247. 5MW by wind they will generate energy for 7-12 cents/kWh. There areseveral advantages for this energy is its low price, price stability, and clean it does not produce carbon dioxide. According to oracle research poll commissioned by the Canadian wind energy association 76% of British Columbians strongly agree wind energy should be further developed as a source of clean electricity. If wind turbines were manufactured in BC it creates 6 jobs per MW. BC government made a commitment that by 2016 power would come from clean by using renewable sources. Benefits of B. C hydro energy: B. C Ocean energy is a clean and nonpolluting energy there is no carbon dioxide or any other by-products released. It produces no greenhouse gases other waste. It is a renewable energy that will help saves to fossil fuels. The electricity supply is constant and efficient. It no needs no fuel. It produces electricity reliably. Not expensive to maintain plant is expected to be in production for 75 to 100 years. But the initial capital cost to start ocean energy plant is more. B. C has more resources it produces more energy by using resources by using some resources they will cause greenhouse gases and pollutants. By using ocean energy they can generate more amount of electric power. Conclusion: Among these there are many uses if B. C has developed these technologies there is no more power crisis and they can produce large amount of energy with low cost and non-pollutant.