

Energy Education Resources

Making Electricity: Generation Resources

Duke Energy uses many different resources to produce electricity. Resources like uranium, coal and natural gas, are used to produce heat in order to turn water into steam. The steam turns a turbine, which spins, creating electricity.

- **Uranium** is used in nuclear power plants. Heat is created when uranium atoms are split apart.
- **Coal** is burned in large boilers to heat water.
- **Natural gas** can either be burned to heat water directly or to create gases that will spin turbine blades.



Renewable resources, like water, wind and solar, are used to produce power in different ways.

- **Water** at a hydropower plant flows through a turbine, causing its blades to spin.
- **Wind** spins turbine blades, which are usually mounted on top of tall towers.
- The **sun** can be used to produce electricity either by directly converting sunlight into electricity or by using the sun's heat to produce steam.

