## How do we generate electricity?

To produce electricity, a generator needs a source of energy to spin the magnets near the copper wire. The part that spins/turns is called a <u>turbine</u>

A source of energy that gets used up is called a **non-renewable** energy source.

- Fossil fuels = Coal, oil and natural gas

  Burning these heats water and the steam turns the turbine.
- Nuclear fuel = <u>uranium</u> fission = <u>break apart</u>

  Splitting uranium creates heat and the steam turns the turbine.

## Non-Renewable and Renewable Energy Sources

Non-Renewable Energy Source -- Thermal (Heat) Generation

Туре	Interesting Points	Advantage (+)	Disadvantage (-)
Using Fossil Fuels		-	
Using Nuclear Fission			

A source of energy that can be <u>replaced</u> in a short time is called a <u>renewable</u> energy source. We'll look at:

- 1. Hydro-electric
- 2. Wind
- 3. Photovoltaic
- 4. Biomass
- 5. Geothermal

Renewable Energy Source

Type	Interesting Points	Advantage	Disadvantage
Hydro-electric (falling water)			
Wind			
Photovoltaic (solar panels)			
Biomass			
Geothermal			