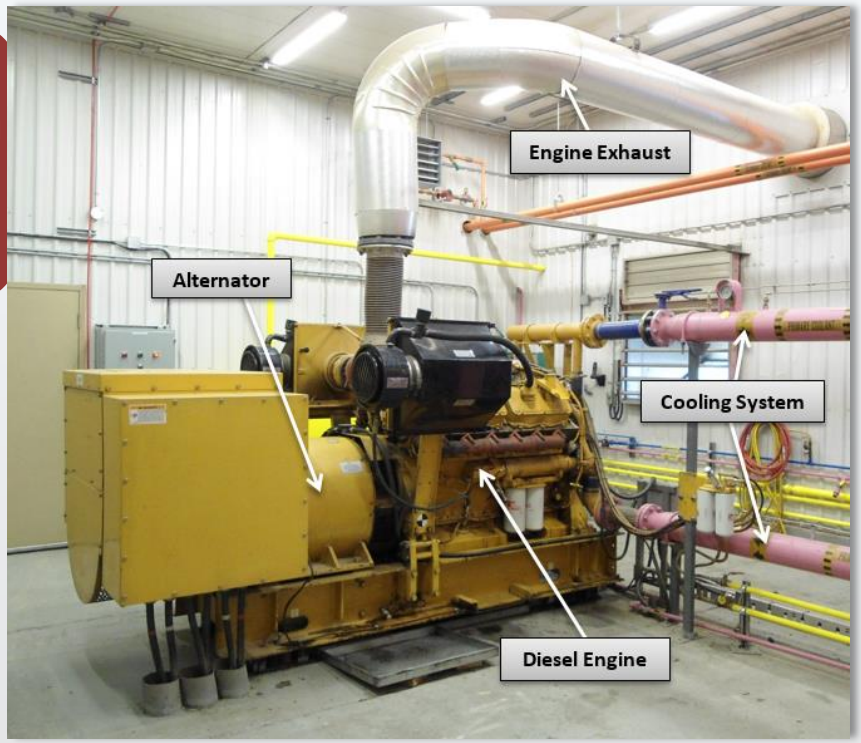
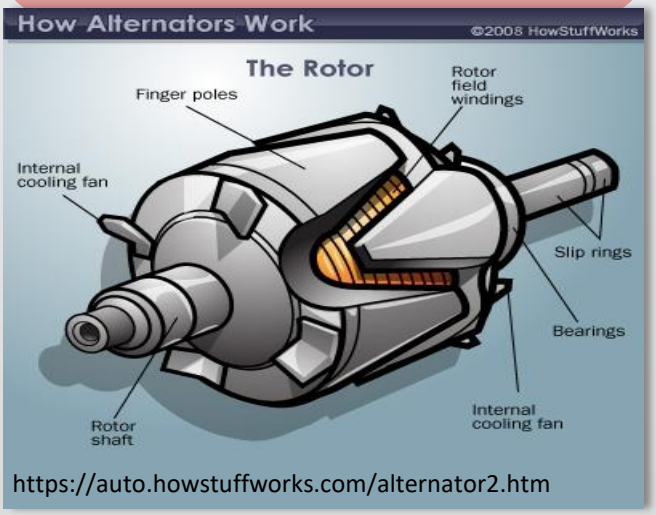
Diesel Generation

Diesel generators are used to produce reliable power to your community. This is done by burning diesel fuel.

DIESEL ENGINES: converts chemical energy found in diesel fuel into mechanical energy in the form of a rotating shaft. Other then the size the engines used are basically the same as a car or truck engine.



ALTERNATOR: coverts the mechanical energy into electricity. The rotating shaft is connected to an electromagnet housed within stationary coils of wire. As the magnet spins, the coils are exposed to a rotating magnetic field. The motion of the field produces electricity within the coiled wires.



https://auto.howstuffworks.com/alternator2.htm

FUEL SYSTEM: Diesel fuel is stored in large tanks to provide for long periods of time. Smaller portions of fuel are pumped from the large tanks to the smaller day tanks as needed to supply the generators.

COOLING SYSTEM: electric generation produces heat. To prevent the engines from getting too hot, liquid coolant it pumped through the engines to absorb and remove the heat. The pink pipes carry coolant

EXHAUST SYSTEM: Engine exhaust is released into the atmosphere through mufflers and exhaust stacks. Strick emission and noise regulations are put in place to minimize noise and pollutants.