

East Durham Wind Energy Centre

Fact Sheet

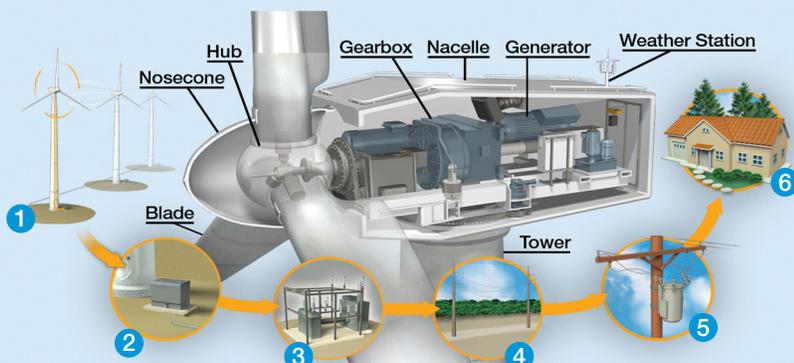


About NextEra Energy Canada, LP

- » A leading renewable energy developer in Canada
- » A subsidiary of NextEra Energy Resources, LLC, the largest generator of renewable energy from the wind and sun in North America.
- » Focused on developing electricity derived from clean, renewable sources throughout Canada.
- » Headquartered in Toronto, Ontario
- » Currently operating wind energy centres located in Alberta, Nova Scotia, Ontario and Quebec
- » Visit us at www.NextEraEnergyCanada.com

How a wind turbine works

- 1 A computer turns the nacelle and the rotor (which consists of three blades and a hub) to face into the wind. The turbine blades turn a generator to produce electricity. For safety purposes, the turbine shuts down automatically if the wind speed exceeds 55 miles per hour.
- 2 The electricity travels down the inside of the tower through electrical cables to a transformer at the base of the wind tower.
- 3 From the transformer, the electricity flows through an underground collection cable to an on-site substation.
- 4 From the substation, overhead electrical cables take the electricity to an off-site substation and into high-voltage transmission lines.
- 5 The electricity goes from the high-voltage transmission lines into local distribution lines.
- 6 The electricity is then distributed to homes, schools, businesses and other consumers.



Overview

- » Located in Grey County, Ontario
- » Operated by a subsidiary of NextEra Energy Canada, LP
- » A 22-megawatt wind generation plant
- » Fourteen GE 1.6-megawatt turbines that are capable of generating enough electricity to power more than 5,500 homes
- » Each turbine is approximately 80 meters tall from the ground to the hub in the center of the blades
- » Began commercial operation in 2015

Benefits

- » Provides employment opportunities
- » Makes property tax contributions to the municipalities
- » Makes payments and contributions to local community
- » Creates no air or water pollution
- » Uses no water in power generation
- » Allows land to remain in agricultural use
- » Supports economy through purchases of regional goods and services