

Exaggeration vs Reality: Wind Power in Montana

Debunking exaggerated claims can be tricky since they often contain a kernel of truth that makes them seem convincing. But the truth is, while all energy resources have environmental or health impacts, harnessing wind to generate electricity is safe and far less impactful than conventional technologies.

Here is some context to negative exaggerations about wind power:

EXAGGERATION:

Wind turbines fall over, sending blades or other components flying



Wind turbines destroy property values



Wind turbines kill too many birds and bats



REALITY:

Large utility-scale wind turbines were first deployed in the 1980s and as with anything new, there were growing pains. Now, after decades of technology advancements, wind turbines have improved drastically. Much like how air travel is significantly safer than it was 40 years ago, catastrophic wind turbine failures are now exceedingly rare. Blade manufacturers require tests of blade properties, static mechanical tests, and fatigue tests to certify wind blade and wind turbine designs.

The impact of wind turbines on property values isn't one-size-fits-all: it depends on location, distance, and time. Studies show that urban areas see more negative effects on property values than rural ones, and these impacts tend to fade over time. Estimated impacts range from 0% to an 8% drop when a large wind farm is first announced within a mile of a home. A March 2024 study found that having a wind turbine in a home's viewshed reduces the sale price by 1.12% on average.

Wind turbines do cause some bird and bat deaths, but compared to other hazards, their impact is minimal. The U.S. Fish and Wildlife Service estimates 234,000 birds die from wind turbine collisions annually, or 0.04% of birds who die from plate glass window collisions. Other energy sources, power lines, and even house cats pose far greater risks than wind turbines.

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EXAGGERATION:

Wind turbines
are too noisy



Wind farms are
bad for farmers
and rural
communities



REALITY:

In the 80s this was true, but modern designs are far quieter. A 2021 Department of Energy study found that noise from a large Wyoming wind farm would likely stay below 55 decibels – about as loud as a conversation at home. For comparison, 60 decibels is like standing 20 feet from a running air conditioner, while 50 decibels is like standing 50 feet away. In most cases, the sound of rustling leaves or the wind itself can mask turbine noise entirely, according to a study by Tetra Tech.

Wind farms are actually a financial win for many rural communities. They generate tax revenue, provide landowners with steady income, and minimally disrupt farming. According to the National Renewable Energy Laboratory, about 98% of land in a typical wind farm remains available for agriculture or other uses. The New York Farm Bureau even confirms that livestock graze right up to turbine bases, unaffected by their presence. For many farmers, wind turbines are just another reliable "crop", paying rain or shine.

