

The Power of Pig Poo 猪粪的力量

英语学习点: *Renewable Energy* 再生能源

With revenue from pig products getting smaller every year, some farmers from rural England have decided to make some extra money by turning poo into profit.

James Hart, who runs a pig farm, came up with a simple solution of using the huge amount of pig faeces, cow dung and chicken droppings on his farm to generate electricity.



James Hart has found a new source of renewable energy on his farm.

It may look unremarkable from the outside, but inside Glebe Farm there is a state-of-the-art biogas station. It's one of only a few in the UK, which has been slower than many of its European neighbours in developing renewable energies such as wind turbines and solar panels.

So how does it work? Large quantities of animal waste are mixed with lots of grass in a tower. Bacteria then break it all down, producing methane, which is siphoned off, cleaned and filtered.

The gas is then used to power an engine which in turn powers a generator. The electricity from this is then fed into the National Grid. Mr Hart thinks he'll be able to sell 2.2 million kilowatt hours of electricity every year.

The heat generated by the process is also captured and used for central heating at the farmhouse.

But it's not only Glebe Farm which benefits. Methane is one of the most powerful greenhouse gases - 20 times worse than carbon dioxide in trapping heat in the atmosphere. By capturing so much of it, Mr Hart expects to reduce his carbon footprint by about 10,000 tonnes a year.

James Hart says he's pleased because he's managed to find another source of income and improve his environmental impact.

词汇表请参看答案与词汇部分

Quiz 测验

阅读短文并回答问题。

1. Are farmers making big profits from their pig products?
2. Find four words in the article which mean animal waste.
3. Is the UK leading Europe in developing renewable energies?
4. Which is worse for the environment: methane or carbon dioxide?
5. Why is James Hart pleased?

Exercise 练习

请你在不参考课文的情况下完成下列练习。从每个表格中选择一个语法正确且意思合适的单词填入句子的空格处。

1. James Hart is _____ a profit from biogas.

doing	make	making	do
-------	------	--------	----

2. A _____ of grass and faeces creates the gas.

mixing	mixed	mixture	mix
--------	-------	---------	-----

3. Renewable energy never_____.

runs up	runs over	runs down	runs out
---------	-----------	-----------	----------

4. Mr Hart also _____ his farmhouse from the process.

heats	heater	heating	hot
-------	--------	---------	-----

5. He hopes his biogas plant will make an _____ to the environment.

better	improvement	improve	increase
--------	-------------	---------	----------



Answers and Glossary 答案与词汇

Quiz 小测验

1. Are farmers making big profits from their pig products? No. "With revenue from pig products getting smaller every year..."
2. Find four words in the article which mean animal waste. Poo, faeces, dung, droppings.
3. Is the UK leading Europe in developing renewable energies? No. "It's one of only a few in the UK, which has been slower than many of its European neighbours in developing renewable energies."
4. Which is worse for the environment: methane or carbon dioxide? "Methane is one of the most powerful greenhouse gases - 20 times worse than carbon dioxide in trapping heat in the atmosphere."
5. Why is James Hart pleased? "James Hart says he's pleased because he's managed to find another source of income and improve his environmental impact."

Exercise 练习

1. James Hart is making a profit from biogas.
2. A mixture of grass and faeces creates the gas.
3. Renewable energy never runs out.
4. Mr Hart also heats his farmhouse from the process.
5. He hopes his biogas plant will make an improvement to the environment.

Glossary 词汇表

poo - 屎, 粪便	faeces - (猪) 粪
dung - (牛) 粪	droppings - (鸡) 屎
biogas - 生物气体	renewable energies - 再生能源
wind turbines - 风力涡轮发电机	solar panels - 太阳能电池板
animal waste - 动物粪便	methane - 沼气, 甲烷
siphoned off - 吸走	generator - 发动机
National Grid - 全国高压输电网	kilowatt hours - 千瓦小时
greenhouse gases - 温室气体	environmental impact - 对环境的冲击