

Automobiles

汽車

Learning about forces

Energy associated with the motion of an object is called kinetic energy. Energy stored in an object due to its position is called potential energy. Energy can be converted between potential and kinetic based on an object's motion.

Balloon Cars – Making it move!

The concept behind the balloon-powered car is pretty simple, but that doesn't make it any less impressive. When you blow up the balloon, set your car down, and let it go, escaping air from the balloon rushes out of the straw. And this gives the car motion. The potential energy of the car is stored in the expanding elastic material of the balloon. As the balloon fills with air, it adds more potential or 'waiting' energy. As the air flows from the balloon, the energy changes to kinetic energy or 'moving' energy. The moving balloon-powered car uses this kinetic energy.

The Grade 1 students had a blast learning about energy and the science behind the balloon-powered car, and they also did a stellar job with following the design process while building and testing their balloon-powered cars.

學習力和能量

與物體運動相關的能量被稱為動能。由於物體位置關係而儲存在物體中的能量稱為勢能。根據物體的運動，能量可以在勢能和動能之間轉化。

氣球車 - 讓它動起來！

氣球動力汽車背後的概念非常簡單，但這並不會降低它給人的印象。當你吹氣球、放下你的車子並讓它離開時，氣球中漏出的空氣會從吸管中噴出，這給汽車帶來動力。汽車的勢能儲存在膨脹彈性的氣球中，當氣球充滿空氣時，它增加更多的勢能或「等待」的能量。當空氣從氣球中流出時，能量轉化為動能或「移動」能量。氣球動力汽車利用了這種動能進行移動。

一年級的學生在學習有關能量和氣球動力汽車的科學原理時非常開心，他們在製作和測試氣球動力汽車時也表現出色，並遵循了設計過程。

1

ASK + IMAGINE
提問 + 創思

2

We learned all about potential and kinetic energy and how it works.
我們瞭解所有關於勢能和動能以及其工作原理的知識。



4

CREATE
創造

We helped each other and worked together on making our balloon-powered cars.
我們互相幫助，共同製造我們的氣球動力汽車。



3

PLAN
計畫



After getting all the required materials, we set to work on building our cars.
獲得所有所需的材料後，我們開始著手製造我們的汽車。



5

IMPROVE
改進



Testing was the most FUN! We got to race our cars and see which ones go the fastest.
測試是最有趣的！我們必須對我們的汽車進行比賽，看看哪輛開得最快。

