

# POP! TEACHER RESOURCE

## Lesson Plan

### Pulley Power

Lesson Plan for *Cranes*  
Grade 1

#### Objective

To help students combine information from a text and a video to build their understanding of pulleys.

#### Things Needed

- *Cranes* book
- Access to the “Cranes” web page on the Pop! website:  
<https://popbooksonline.com/construction-vehicles/cranes>
- Access to the PBS Kids “Design Squad Nation: Pulleys” video listed on the “Explore Links” tab of the Pop! web page. This video can also be found here:  
<http://pbskids.org/video/design-squad-nation/2342064713>

#### Before the Activity

Read *Cranes* out loud to students. Open the “Cranes” web page in your internet browser. Pull up the “Explore Links” tab and click on the PBS Kids website, “Design Squad Nation: Pulleys.”

#### Activity

To start, watch the video on how pulleys work. Then, students should use that video as well as the text and image on pages 12 and 13 of the *Cranes* book to answer the following questions:

- What are the parts that make up a pulley? (Possible Answers: a wheel, a rope, an axle, a load)
- How does a pulley work? (Answer: A piece of rope curves around a wheel. Pulling down on one end of the rope causes the wheel to spin. The other end of the rope lifts up.)
- What can pulleys be used to do? (Answer: Pulleys can be used to lift things.)
- What examples does the video give for how pulleys could be used? (Answer: The video showed a flag being raised on a flagpole. It also showed cat food being lifted via a pulley system.)
- What example does the book give for how pulleys could be used? (Answer: The book talks about how cranes use pulleys to lift loads.)
- Can you think of another situation where a pulley could help people lift something? (Answers will vary.)



**Evaluation**

Could students answer questions about how pulleys work and what they can be used for? Could students think of other situations where a pulley would be useful?

**Standards**

This lesson plan may be used to address the Common Core State Standards' reading standards for informational texts, grade 1 (RI 1.6).

