



Fractured Folktale: Paul Bunyan

Bring a mighty fractured folktale to life with a STEAM challenge that boosts fluency, comprehension and hands-on creativity! Inspired by *BrickLAB Magic Beans* Enrichment Program, this activity welcomes learners' larger-than-life imaginations with a twisted tall tale and an exciting design challenge.



HANDS-ON STEM EDUCATION

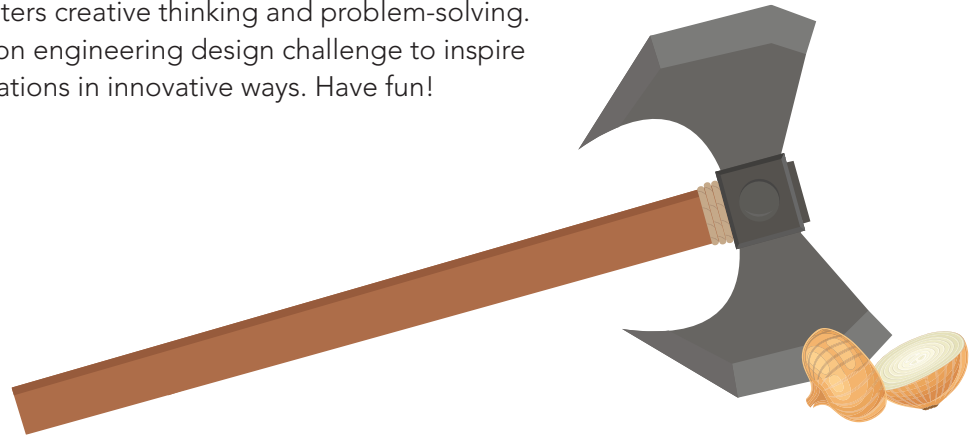
For over 30 years, PCS Edventures has inspired students to develop a passion for Science, Technology, Engineering and Mathematics (STEM), focusing our efforts on making learning and discovery a fun and interactive process for grades K-12.

- Classroom
- After-School
- Home Learning

Background Information

Paul Onion is a fractured fairytale based on the American and Canadian folk hero, Paul Bunyan. Northern American loggers once shared stories about this larger-than-life hero, giving him superpower-like abilities that helped the lumberjack community. His tall tale, or exaggerated, stories also often feature his large and strong animal companion, Babe the Blue Ox, as well as his handy giant ax.

In this activity, learners can become actors in a play that reworks Paul Bunyan's classic tale into one that fosters creative thinking and problem-solving. Follow that with the hands-on engineering design challenge to inspire learners to use their imaginations in innovative ways. Have fun!



MATERIALS:

Provide a variety of materials to choose from. Some examples include:

- cardboard tubes
- craft sticks
- pipe cleaners
- empty boxes
- plastic bottles/bottle caps
- recycled food containers
- construction paper
- toothpicks
- any other readily available materials

You'll also want to provide a standard set of measurement tools to test the weight each design can support. For example, you may use **small weights, wooden blocks, bean bags,** or **pre-weighed plastic bags of rice** (i.e. ½ lb bags).

Design Challenge Scenario

This design challenge was created using the steps outlined in PCS Edventures' blog post, *Bring Stories to Life with STEAM*. Click the link below for step-by-step tips on turning any tale into engaging STEAM challenges.



<https://edventures.com/blogs/stempower/bring-stories-to-life-with-steam>

DESIGN CHALLENGE

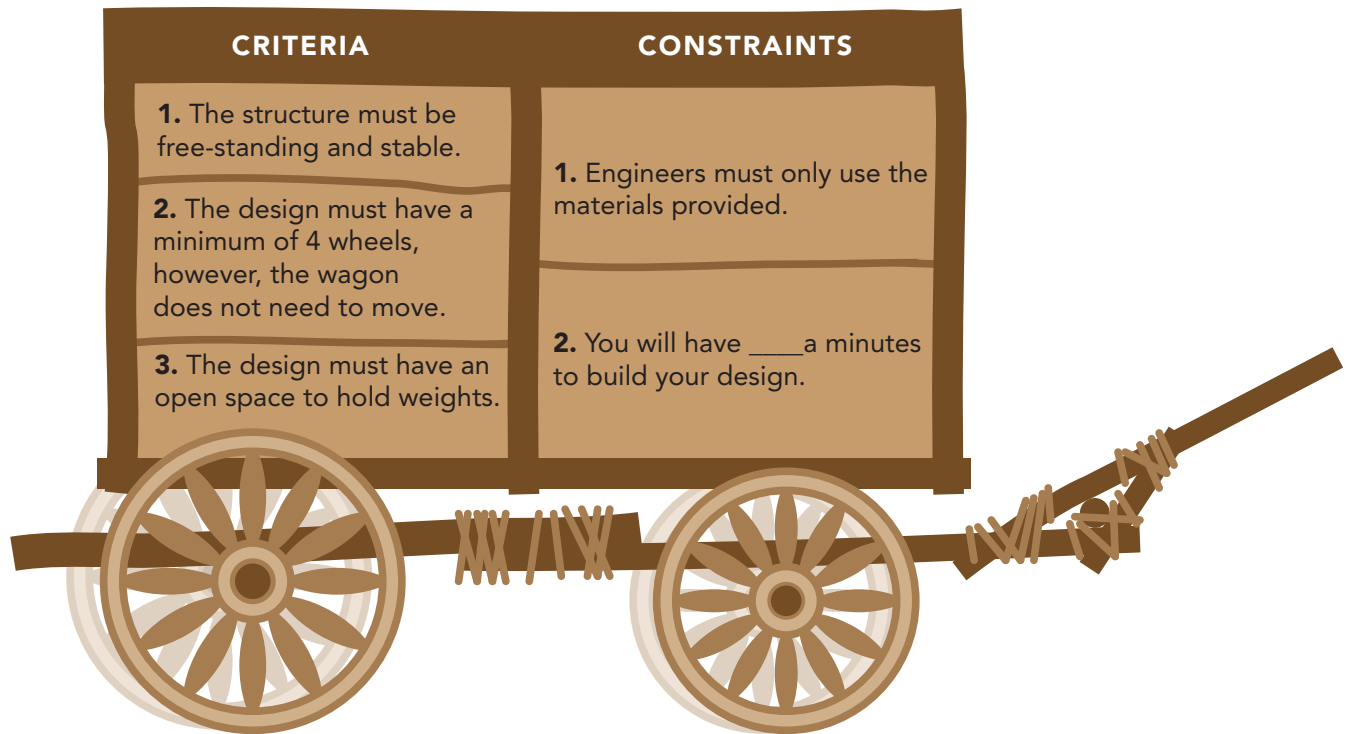
Paul Onion is always helping out his fellow loggers in town and as thanks, he's collected more onions for his burgers than ever before! Help Paul design a wagon that will support the great weight of his many onions.

DIRECTIONS:

- 1 Prepare to do a table reading of *Paul Onion*. For a full production of the play, you'll need about nine actors:
 - Narrator
 - Paul Onion
 - Mom
 - Five Townspeople
 - Gabe
 - Friends (Any number of actors)

Roles can be combined if you have fewer actors. Alternatively, if the number of participants is much higher, either take turns reading different sections of dialogue or do multiple readings of the play.

- 2 Present learners with the design challenge. Be sure to review the criteria and constraints of the challenge. See below for a sample T-Chart you can create with your learners that can be customized to fit your specific learning environment:



Encourage learners to use the Engineering Design Process (Ask, Imagine, Plan, Create, and Improve).

- a. What are the required features or functions that the wagon design must have to be successful?
 - b. What are the limitations on the design, such as materials, cost, or time?
- 3 As learners work through the challenge, remind them that their designs may continually change through trial and error. They should test their design throughout the building process and revise based on test results.
- 4 Have learners share their completed designs, reflect on the process, and discuss any final thoughts related to the story or the characters.

DISCUSSION QUESTIONS:

- What were the strengths of your design?
- What design changes would you make if you worked on this challenge again?
- What challenges did you have to overcome?

EXTENSIONS:

- ELA: Challenge learners to create a fractured folktale all their own! Choose a classic tale that they can retell imaginatively.
- STEAM: Put on a production of Paul Bunyan. Encourage learners to create props and scenery to bring their rendition to life!
- Social Studies: Research the origin of Paul Bunyan and the people who shared his story throughout Northern America and Canada. Discuss why lumberjacks may have created such extraordinary stories about this larger-than-life folktale hero.

References:

Britannica, T. Editors of Encyclopedia (2021, September 12). Paul Bunyan. Encyclopedia Britannica. <https://www.britannica.com/topic/Paul-Bunyan>

Martin, J. M. C. (2004). 12 Fabulously funny folktale plays. Scholastic Professional Books.

Fractured Folktale

Paul Onion

Based on "Paul Bunyan"

Characters:

- Narrator
- Paul Onion
- Mom
- Five Townspeople
- Gabe
- Friends (Any number of actors)

If class numbers don't add up to the character list, find creative ways to get everyone involved. If numbers are much higher, either have campers take turns reading different sections of dialogue or do multiple readings of the play. It's also okay if not everyone reads each day, just as long as campers take turns and the actors change each production. If numbers are lower, have campers take on two roles, adding a different accent or special flair to each part they're playing!

NARRATOR: During the earliest days in American history, there lived Paul Onion, the biggest baby anyone had ever seen. The people in town claimed he weighed nearly 50 pounds, eating all the food he could get his hands on. He loved to eat burgers with extra onions most of all.

MOM: My dear Paul grows taller each day! His shirts are so big, I have to use tree stumps for buttons. Even his beard gets longer by the hour. He combs it with a pine tree to keep all his food from getting trapped in there!

NARRATOR: As Paul continued to grow into a man, the townspeople were not at all afraid of him, for Paul often helped them with their daily chores. All he asked in return was that they provide him with an onion bulb from their garden to top his giant burgers.

FIRST TOWNSPERSON: Paul, please come help us! Our flowers once brought so much joy and life to our town, but they've all started to wilt. Is there anything you can do to help them bloom again?

PAUL ONION: Hmm. Let me see what I can do.

NARRATOR: Paul called for his best pal, his giant blue-ox, Gabe. Gabe came at once, pulling a large wagon full of the many onions Paul had collected.

GABE: Is it time to eat again, Paul?

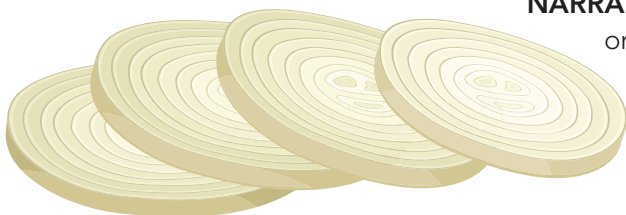
PAUL ONION: Soon, my friend. I'll just need a few dozen onions first.



NARRATOR: Using his handy ax, Paul began to chop so many onions. In no time, everyone's eyes began to water.

SECOND TOWNSPERSON: All that slicing of onions is making me cry!

GABE: Sniffing Me too!



NARRATOR: Gabe and Paul’s giant tears fell atop a bed of wilted flowers. Suddenly, the flowers began to bloom once more.

FRIENDS: Hurray! Our town is beautiful again. Thank you, Paul!

PAUL ONION: Happy to help!

NARRATOR: Later, just as Paul and Gabe were about to take a bite of their delicious burgers, piled high with all their freshly cut onion slices, another townspeople called for help.

THIRD TOWNSPERSON: Our town has become so crowded since more people have sailed to America and stayed along the northern border. We need more space to build homes. Is there anything you can do to clear a bit of the dense forests surrounding our town?

NARRATOR: Paul nodded and walked toward a vast area full of tall trees. He took a monstrous bite of his onion-filled burger and let out a long breath.

GABE: Timmmm-berrrr!

FOURTH TOWNSPERSON: Wow! He took down 10 white pines with a single blow of his stinky onion breath!

FRIENDS (all talking at once): Amazing...we have so much more space now!... Paul is incredible... Gee is it stinky here now!... Thank you, Paul!... Here, please take an onion from my garden and enjoy!



PAUL ONION: I hope you all have plenty of space to build your homes now.

FIFTH TOWNSPERSON: Oh we certainly do! Even better, we have enough room for a special surprise!

NARRATOR: All of Paul’s friends whispered something in Gabe’s ear. The giant blue-ox ran off and returned a week later pulling an enormous grill pan behind him. Delighted, Paul used the fallen pine trees to start a giant campfire and placed the grill pan on top.

GABE: Now we’re cooking!

NARRATOR: That day, Paul and his friends gathered around the campfire and made thousands of burgers to feed everyone in town, each one topped with extra onions.

Featured Product



This STEAM activity is inspired by the activities found in BrickLAB Magic Beans Enrichment Program. Fractured Folktales included in the program are:

Stone Slope	Aladdin and the Magic Pickle Jar	The June Bug and the Flea	The Prince Frog
Queen Midas	Jack and the Giant Sunflower	Claynocchio	Clinky Planky Tenbo
Three Silly Goats Gruff	The Elves and Young Stu Baker	Thaddeus Thumb	The Pig Who Cried Wolf

Plus, your purchase comes with:

- Featured Story Read Aloud
- Step-By-Step Build Instructions
- Engineering Challenges
- Optional English Language Arts Extension
- Closing Discussions

The BrickLAB Magic Beans Enrichment Program is a fairytale dream come true!
 Speak with a *STEM Program Specialist* to get yours today.



For more information, visit: <https://edventures.com/collections>
or contact a STEM Program Specialist at (800) 429-3110

PCS edventures!TM
Experts in Hands-On **STEM** Education

