

# Week 1: Build a Bridge

# Complete the Challenge.

Build a bridge with the longest possible span that can carry the most weight.

The Rules	
You CAN:	You CAN'T:
<ul> <li>You can research different bridge designs to help figure out what type of bridge will be the strongest.</li> <li>You can make the bridge as long as you want, just remember that it also has to support weight .</li> </ul>	<ul> <li>X You can't use a pre-made bridge model or building kit.</li> <li>X You can't use something that acts like a bridge by itself (like 1 long piece of wood). The roadway of your bridge should be more than just one item!</li> </ul>
✓ You can build your own support structures or attach the ends of the bridge to something prebuilt, like a chair or a wall.	$oldsymbol{\lambda}$ You can't support the span in the middle or attach the bridge to the ceiling.
When you're done, test the limits of your bridge. How much weight can it hold? Can you change it to support even more weight?	
😡 Our tips to avoid angry parents 😀	
DON'T	DO:
Don't make your siblings or pets walk across the bridge.	Clean up after yourself. Always leave your workspace cleaner than you found it.
<ul> <li>Don't build you bridge in a place that's in the way.</li> <li>Don't use anything fragile to build your bridge or transport anything fragile over your bridge!</li> </ul>	<ul> <li>Get permission to use your materials.</li> <li>Keep trying! Your bridge probably isn't going to work the 1st time.</li> </ul>

# 2

#### Create a video of your solution.

Try to keep your video under 90-seconds long and include the following:

- How does your solution work?
- What materials did you use?
- Did you have to overcome any problems?

You can see tips to creating great entry videos here.

Your video will be visible to anyone with an internet connection, so it's important to protect your privacy and stay safe. See our <u>website</u> for more information.



## Enter the contest by 9:00pm ET on June 23, 2024.

Ask a parent to upload your video to our website using our online entry form.

All contest entries will receive  $\underline{1}$  point for our big end-of-the-summer prize drawing! You can earn bonus points for:

- Completing our weekly online STEM course 1 point
- Entering an Epic Fail 1 point
- Getting a friend to participate in their first ever Invent the Summer challenge (make sure they give you credit) 5 points
- Completing 3 challenges in a row 3 points
- Completing 5 challenges 5 points
- Completing ALL 8 challenges 5 points

### View other solutions and VOTE!

You can see all the solutions and vote for your favorites from 12:00pm ET on Monday, June 24 until 3:00pm on Tuesday, June 25. See our <u>voting rules</u> for more

# Winners announced by 8:00pm on June 25!

Audience Choice Award: Goes to the solution with the most online votes.

**Board Choice Awards:** Selected by the Junior Board of Engineers. Solutions will be judged on originality, execution, and presentation.

**Epic Fail Award:** Show us your failed attempts! This award goes to the most impressive failure of the week.

Winners receive their choice of an *Invent the Summer* t-shirt, bag, or notebook.