## Coopers on *Constitution* Building a Barrel

Target Grade Level: 2nd-5th

Time for Lesson: 60 minutes

## **Overview & Major Themes**

There were several men on board USS *Constitution* during the War of 1812 who were not sailors but tradesmen. One of them was a cooper, a man who knew how to make and repair barrels. In this lesson, learn about the tradesmen needed to keep the ship afloat, and make a craft barrel with your students.

Objectives	Outcomes	Materials & Resources
Students learn about the different materials USS <i>Constitution</i> was built from (wood, canvas, rigging) and the tradesman like the carpenter, cooper, armorer, and sailmaker, who kept the ship in good condition. Students will learn about trades and jobs on board <i>Constitution</i> during the War of 1812, and why these men were important.	Students will understand USS Constitution was a wooden ship that required maintenance performed by tradesmen, who possessed a set of specialized skills. Students will come away with an understanding of different materials used on board Constitution. Students use craft materials to create their own miniature version of a barrel and understand what a cooper does.	<ul> <li>Numerous wooden clothespins (twisted apart so you have singular wooden sticks with ridges)</li> <li>Several nut cans, mini-Pringles cans, or any cylindrical can (without sharp edges)</li> <li>Markers or colored pencils</li> <li>Rubber bands</li> <li>Thin metal wire</li> <li>Pliers</li> <li>A Sailor's Life for Me "Hold" scene, online or printout</li> <li>Image of Constitution</li> <li>I Wood block</li> <li>I Piece of rope</li> <li>I Piece of canvas</li> </ul>

Time	Instructional Activity	
5 min.	Explore the A Sailor's Life for Me "Hold" scene (online or printout) with your students. What do they see? What do they think this room was used for? Explain that Constitution was a wooden ship, and the "Hold" was a place on board that was used to store materials, food goods, and water. It was the lowest part of the ship, and therefore it was below the "waterline."	

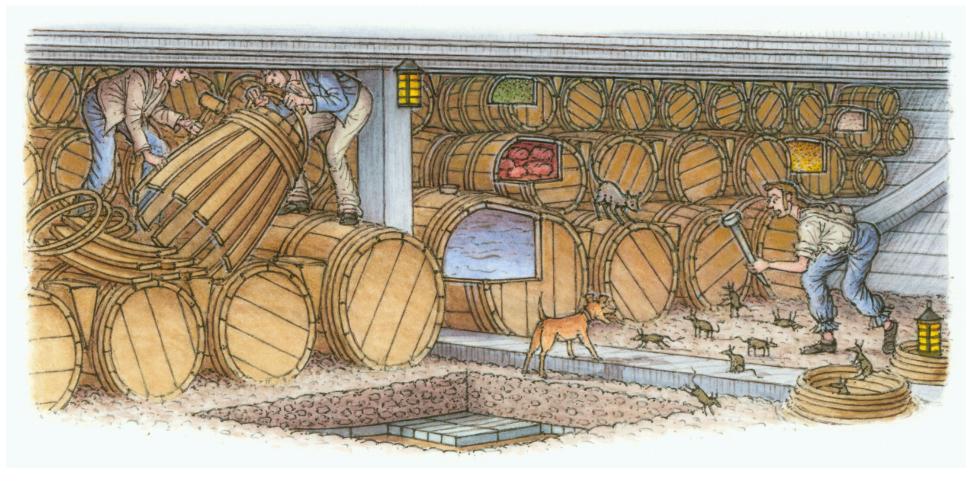
Time	Instructional Activity
10 min.	Pass out the wood block, the piece of rope, and the piece of canvas to students. Show them the image of <i>Constitution</i> (included below) and explain that <i>Constitution</i> was built of wood. The canvas and rigging (rope) were used for the sails and served as the "engine" of the ship; <i>Constitution</i> did not have a motor like a car or a speedboat today.
2 min.	Explain to students that although <i>Constitution</i> needed almost 450 sailors to keep her afloat, the ship also needed people on board who had a trade, that is, a job that required a special skill to keep the ship sailing and in good shape.
5 min.	List the following names of tradesmen on the board: Carpenter, Cooper, Sailmaker, and Armorer. Ask students: what do you think their trade was? Have students examine the materials you handed out to them to pass around, and to match the material with the trades listed here: Carpenter: worked with the wood; restored the planks/hull when needed; Cooper: built barrels to hold food, water, and gunpowder; Sailmaker: made and repaired the canvas sails; Armorer: repaired the guns on board.
2 min.	Explain to students that they are apprentices to <i>Constitution</i> 's cooper and they will be making their first miniature barrel. An apprentice is someone who is learning a particular trade.
5 min.	Pass out materials to each student or team of students: a can, rubber bands, and numerous halves of wooden clothespins.
15 min.	Instruct students to place two rubber bands around the outside of the can, and encircle the can with the clothespins, sliding them under the rubber band. The rubber band should fit into the two little grooves of the clothespin.
15 min.	Play the role of Master Cooper and inspect their work to make sure there are not any big spaces between the clothespins. Then, wrap wire around the clothespins, inside the grooves of the clothespins. Twist the wire into place and tuck in any sharp ends (you might need pliers to do this).
15 min.	Students decorate their barrels with their names and colors.



## USS Constitution, by Marshall Johnson

Oil on canvas, 1850–1921 This painting depicts a starboard view of USS Constitution under sail. Courtesy USS Constitution Museum, Boston, MA . Given in memory of Captain William Douglas Wales, USNR, by his family and friends.

## The Hold



In the deepest, darkest, dingiest place at the very bottom of *Constitution* is the hold: a gigantic wooden warehouse. Here, packed tight in barrels, is enough food, water and other provisions to supply the ship for six months. However, the crew won't eat and drink all of this. They share it with hundreds of rats. Rats don't just eat the tubs of bread, meat, cheese and beans. If the crew don't control them, they can even gnaw holes right through the ship's hull.