Educational Product	
Educators & Students	Grades K-5

National Aeronautics and Space Administration

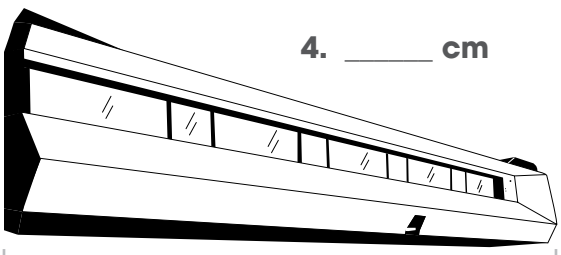
Name:_____

Date:_____

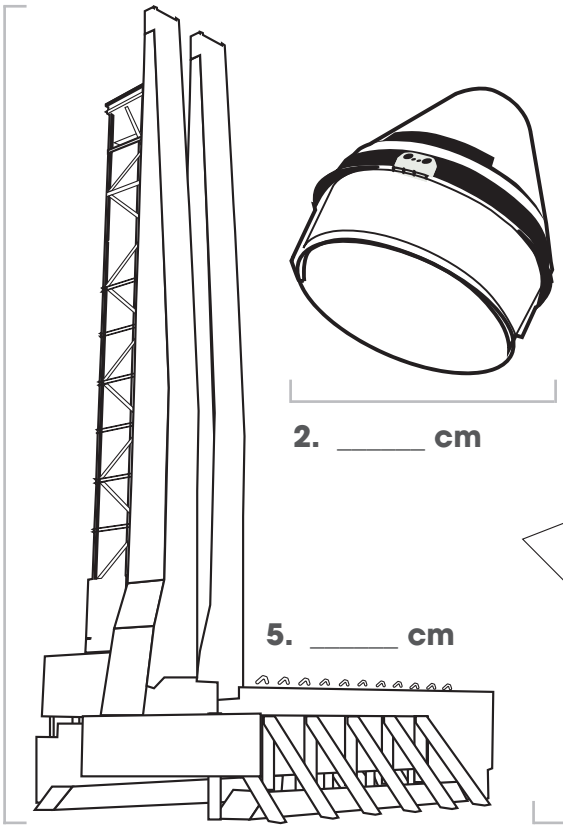
COMMERCIAL CREW PROGRAM: WHAT'S IT ALL ABOUT?

Measuring with NASA's Commercial Crew Program

Directions: Engineers at NASA use measurement to help make each rocket launch successful. In the drawings below, practice your measurement skills with the items that will be part of the upcoming launch. Round the length of each item to the nearest centimeter using the markings next to each item and the centimeter ruler provided on the Rocket Launch Key Terms page. Use the key terms on the back to learn more about each of these items!

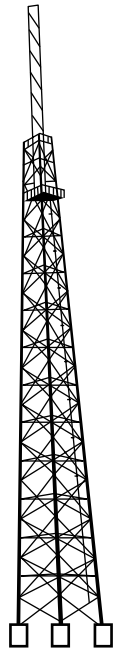


4. _____ cm

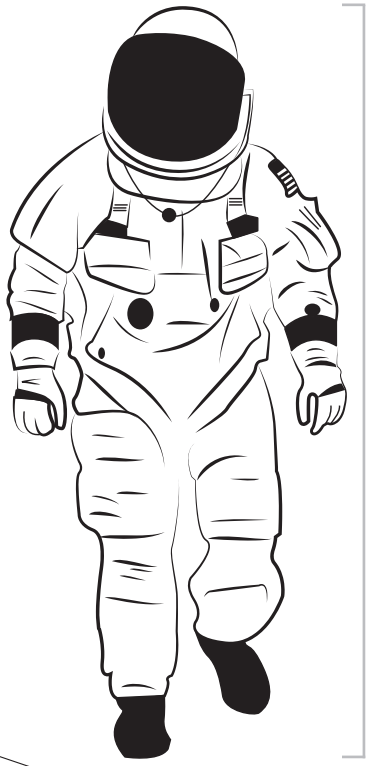


5. _____ cm

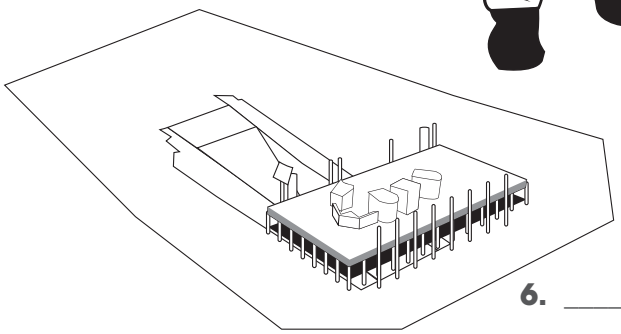
2. _____ cm



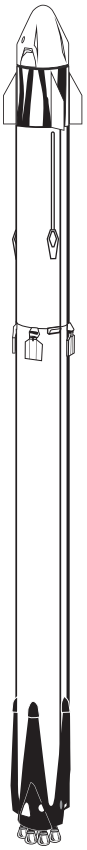
7. _____ cm



1. _____ cm



6. _____ cm



3. _____ cm

Want to learn more about the launch pad?
With your teacher's permission, research the actual height of the items out on the launch pad for NASA's Commercial Crew Program in this activity!

Rocket Launch Key Terms

1. **NASA Astronauts:** These will be the first American astronauts launching to the space station from American soil on American spacecraft since the Space Shuttle Program ended in 2011.

2. **Spacecraft:** Astronauts are buckled into the spacecraft located on top of the rocket during launch. The spacecraft will also dock to the space station and return astronauts safely to Earth after their mission.

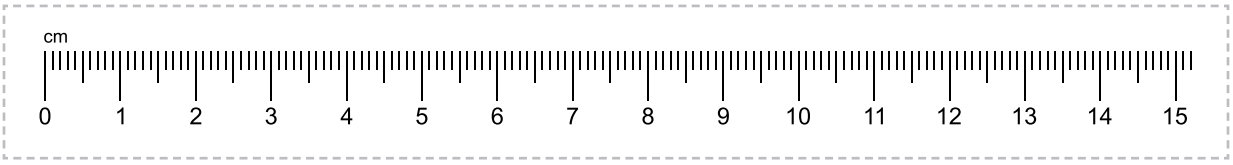
3. **Rocket:** The rocket holds the fuel used to launch the spacecraft through the Earth's atmosphere on its way to the International Space Station.

4. **Crew Access Arm:** Astronauts walk across the crew access arm as they enter the spacecraft located on top of the rocket launching them into space.

5. **Launch Tower:** The launch tower provides the rocket with stability, electricity and fuel before a launch. Astronauts travel up the launch tower as they get ready to board the spacecraft.

6. **Launch Pad:** The rocket rests on top of the launch pad before liftoff. During liftoff, the launch pad is designed to handle an extreme amount of fire and smoke caused by the rocket.

7. **Lightning Towers:** Towers placed on each launch pad are designed to attract lightning, protecting the rocket and launch tower from lightning strikes before liftoff.



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