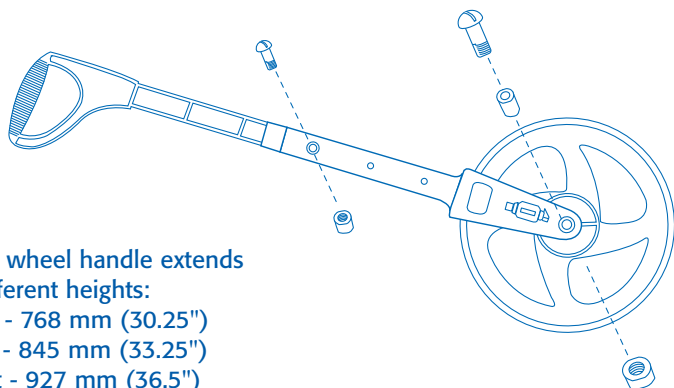
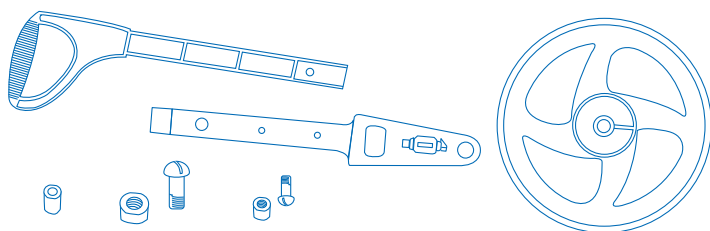




The trundle wheel handle extends to three different heights:

Lowest - 768 mm (30.25")

Middle - 845 mm (33.25")

Highest - 927 mm (36.5")

Introduction

The trundle wheel is a common tool used to measure distances. Surveyors, law enforcement officials, landscape designers, and people in numerous other occupations use trundle wheels to measure distances. Students will enjoy the various trundle wheel activities while mastering the ability to measure length.

How Tall Is the Class?

Line up all the students in the class, head to toe.

Measure the total height of the class with the trundle wheel.

Make sure the counter is at zero. Start at one end of the line with the zero on the trundle wheel at the beginning of the line. Roll the trundle wheel to the end of the line and record the total length. Use the counter to help record the correct measurement.

Measure just the height of all the girls in the class. Measure the height of all the boys in the class. Create a class graph to see which group is taller.

Additional Activities

- Have students find the distance from their classroom door to each exit. Which is nearest? Which is farthest away? (Note: If students encounter stairs, ask them how they can measure the horizontal distance of the staircase. One method would be to measure the depth—not height—of each stair and multiply that by the number of stairs.)
- Have students find the distance from their classroom door to other places on campus: the media center, the main office, the gym, and so forth.

Additional Outdoor Activities

- How far can students throw, hit, or kick a baseball or field hockey ball?
- Have students find the perimeter of the school property.

Extension and Enrichment

- Invite students to create graphs or charts representing their findings.
- Invite students to create scale drawings of the school or grounds based on their findings.

Trundle Wheel Orienteering

In this activity, students will follow a trail of markers to uncover a secret password.

In preparation for this activity, you will need to create a list of clues and a series of "markers" to place at points throughout the playground. You will also need to select a secret password the students will discover. Pick your password based on how many markers you want students to travel to and based on a word the students will be excited to discover. A favorite character from a book the class has been reading works wonderfully.

For markers, you may use bottles, milk cartons, or other items that can be weighted down so they won't blow away or move. Each marker will be given a different letter. As students travel from one marker to the next, they will write down the letter of each marker to spell the secret password.

To create the list of clues, simply tell students how far away (in meters) the next marker is. On the day of the activity, lay out the markers based on this list of clues. Make sure one marker can be the answer to a clue.

Give students a list of clues and show the students where to start. Students will read the first clue to find the first distance. They will estimate which marker they believe is that distance away and will use the trundle wheel to verify their guess. If they are correct, they will record the letter of the marker. Students will continue from marker to marker until they have finished the course and found the secret password.