

The Path to Math: Measurement with Young Children



There's more to preschool math than counting! Children ages 3-5 may wonder about measuring many things—from how tall they are to how long it takes to walk around the school. They hear adults talk about miles, pounds, gallons, acres, and minutes. They see adults use measuring tools. Measurement activities can help young children understand basic math concepts and learn life skills.

Include measuring in daily routines.

Children can ...

- Refill food and water supplies for classroom pets (and chart how much they eat).
- Use teaspoons and measuring cups to help make and hand out snacks.
- Use timers to help with turn taking (for example, when sharing popular toys).
- Check a rain gauge or thermometer and report results to the class.

Provide games that use some measuring skills.

- Teach games involving distances (hopscotch, tag, beanbag toss, Candy Land).
- Use a stopwatch or timer for relay races and other games.

Offer other activities related to measuring.

- Provide measuring tools (trundle wheel, ruler, eye dropper, balance, clock) for children to study or to use in dramatic play.
- Help children use nonstandard items (hands, thick string, shoes, unit blocks) to describe the sizes of furniture, block buildings, playgrounds, and each other. “How many unit blocks did it take to get from the classroom door to the window?”
- Offer geoboards, nesting toys, gears, interlocking blocks, stacking toys, mosaic tiles, and fabric squares for “choice time.”
- Provide clear tubes and containers for sand and water play.
- Offer specific amounts of paint. “Can two tablespoons of finger-paint cover your paper? What do you predict?”
- Let children guess the weight of common classroom objects, such as blocks, and then check their estimates for accuracy. Help them chart their guesses and findings.
- Help children notice sizes when they make costumes or doll clothing. Invite them to create scale models of objects from clay, popsicle sticks, boxes, or papier-mâché.

Invite children to think about measurement.

- Use the language of measurement: *unit, fill, load, balance, meter, area*. Ask children to compare: wide/narrow, heavy/light, far/near, now/later. “Which doorway is narrower?” “Is the feather heavier or lighter than the brick?”
- Use children’s questions to launch in-depth studies of how and why people measure things. “Do all lunchboxes hold the same amount of stuff?” “How much does the paper we are recycling weigh?”
- Help children survey adults about what they measure at home and on their jobs.

Any opinions, findings, conclusions, or recommendations expressed in this tip sheet are those of the author(s) and do not necessarily reflect the views of the Illinois State Board of Education.



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