# Lesson 12: Ways to Represent Measurement Situations

### Standards Alignments

|  |  |
| --- | --- |
| Addressing | 3.MD.A.2 |
| Building Towards | 3.MD.A.2 |

### Teacher-facing Learning Goals

* Ask and answer questions about situations involving measurements.
* Interpret representations of situations involving measurements.

### Student-facing Learning Goals

* Let’s make sense of and represent measurement situations at the fair.

### Lesson Purpose

The purpose of this lesson is for students to make sense of situations involving measurements, interpret representations of the situations, and ask and answer questions about them.

In previous lessons, students estimated and measured weights and liquid volumes. They learned a variety of methods and representations to solve problems involving all four operations, and used representations that made sense to them.

In this lesson, students make sense of tape diagrams (MP2), which better represent the continuous nature of measurement contexts. The context of a fair is used in this lesson and subsequent ones.

### Access for:

###  Students with Disabilities

* Engagement (Activity 2)

###  English Learners

* MLR8 (Activity 2)

### Instructional Routines

Card Sort (Activity 2), MLR5 Co-craft Questions (Activity 1), Notice and Wonder (Warm-up)

### Materials to Gather

* Tools for creating a visual display: Activity 1

### Materials to Copy

* Card Sort: Giant Pumpkins (groups of 2): Activity 2

### Lesson Timeline

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| --- | --- |
| Warm-up | 10 min |
| Activity 1 | 20 min |
| Activity 2 | 15 min |
| Lesson Synthesis | 10 min |
| Cool-down | 5 min |

### Teacher Reflection Question

How did you see students using their prior mathematical knowledge to solve problems involving the four operations in these new measurement contexts?

## Cool-down

(to be completed at the end of the lesson) 5min

Which Diagram Matches?

### Standards Alignments

|  |  |
| --- | --- |
| Addressing | 3.MD.A.2 |

### Student-facing Task Statement

Which diagram matches this situation? Explain your reasoning.

A pumpkin farmer used 52 liters to water 13 seedlings equally. How much water was used on each seedling?

A

B

### Student Responses

A. The diagram has 13 parts and each part represents a seedling, but we don’t know how much water each seedling got.