



#### Topic: Using units of measurement

#### Making direct comparisons of height

##### Lesson concepts



**Length** — Language



**Length** — Direct comparison

Today students will:

- ▶ identify the height of objects
- ▶ compare the heights of familiar objects
- ▶ describe the comparative heights of objects.

#### Resources

##### Text

*Goldilocks and the three bears*  
(or another text in which heights can be compared)

##### Find and prepare

Building blocks

Several objects to compare heights  
(for example: pencil case, ruler, box, book, water bottle)

Environment to explore

#### Key terms

For definitions and explanations of terms, please see the [Glossary](#).

## Lesson

### Introduce the lesson

#### Note

The following language is important to highlight and develop throughout this lesson:

height, shorter, short, shortest, tall, taller, tallest, the same, compare, high, higher, highest, low, lower, lowest, as tall as

### Describe the height of objects

#### Build a tower

Provide students with building blocks.

Ask students to:

- build a tower, adding one block at a time
- make the tower as tall as possible without it toppling/falling down.

Discuss the tower using the language of height (such as tall, short, taller, shorter, high, low, the same, height).



#### Focus questions

Q: *How high do you think the tower will be before it will topple/ fall down?*

A: For example: higher than (the chair), the same height as (the table), taller than (the bin).

Q: *How high did you build it?*

A: For example: as tall as (the stool), taller than (the bin).

Q: *Why did it topple/fall down?*

A: For example: It got so tall that the blocks couldn't balance anymore.

Q: *How could you have built a taller tower without it toppling/falling down?*

A: For example: by putting the biggest blocks at the base; by making the base wider.

Provide students with two objects of different heights (such as a pencil case and ruler).

Ask students to line up the base of the two objects to compare their height.

#### Focus questions

Q: *Which object is taller?*

A: Object A is taller than object B.

Q: *Which object is shorter?*

A: Object B is shorter than object A.

### Focus questions

Q: *Would this object still be taller if I moved it away? How could you find out?*

A: For example: Yes, I could move the other object to compare.

Q: *Is this (ruler) too tall to fit in here (pencil case)?*

A: For example: Yes, it won't fit in the pencil case.

## Compare the height of objects

Provide students with several objects to compare the heights (such as a box, book, water bottle).

### Focus questions

Q: *Which object do you think is the tallest?*

A: For example: Object C.

Q: *Which object do you think is the shortest?*

A: For example: Object A.

Discuss ways of comparing the height of several objects, remembering to line up the base of the objects to compare their height.

### Focus questions

Q: *Which object is the tallest/shortest?*

## Identify objects based on their height

Provide students with stimulus images of objects, for example:

- building construction
- city high-rise buildings



Describe and compare the heights of objects in relation to other objects in the images.

### Focus questions

Q: *What is the tallest thing in the picture?*

A: The crane.

Q: *What is the shortest?*

A: The wheelbarrow.

Q: *Is (this) taller than (that)?*

A: Personal response required.

Q: *Why do you think this is so short?*

A: Personal response required.

Q: *What could happen if the truck was taller than the building?*

A: For example: The concrete might pour over the building.

Q: *What could happen if the truck was shorter than the wheelbarrow?*

A: For example: The concrete couldn't be poured into the wheelbarrow.

Ask students to draw or find images to show something short compared to an elephant.

Ask students to draw or find images to show something tall compared to an ant.

### Focus questions

Q: *Is there an image that occurs in both groups?*

A: Personal response required.

Q: *How can a cat be tall in one group, but short in the other group?*

A: For example: A cat is smaller than an elephant and bigger than an ant.

## Compare the height of objects

Read a story such as *Goldilocks and the three bears*.

Discuss how Goldilocks found it difficult to sit in the two larger chairs because of her height.

Reinforce vocabulary such as 'too high', 'too low'.

Ask students to sit on a large adult chair and a standard child's chair.

Refer to chairs or shelves and discuss how things can be too low or too high (too short or too tall) for a student or adult.

### Focus question

Q: *Is this chair the right height for you? Explain.*

A: For example: No, it's too high./Yes, it's the perfect height./No, it's too low.

Explain that students will explore the environment around them to identify objects that are too high or the right height for them.

Ask students to:

- draw images of objects that are too high for them (such as the kitchen sink, light switches)
- draw images of objects that are the right height for them (such as drinking taps, their special chair).

### Focus questions

*Q: How would you describe the height of this object? Is it too tall, too short, too high, too low or just right for you?*

*A: Personal response required.*

*Q: Why would this be placed too (high/low) for you?*

*A: For example: So that I can't reach it.*

*Q: Can you think of a reason why this is that height?*

*A: For example: I might burn myself with hot water from the tap.*

### Say to students

“ When we talk about the height of people or objects, we need to use other things to compare them to. I could say that the door is high, but if I compared it to the roof, the door isn't very high. ”

Ask students to discuss possible answers to the following questions:

- What is short compared to a giraffe? How could you find out?
- How could a dog be short and tall?
- What is tall compared to a mouse?