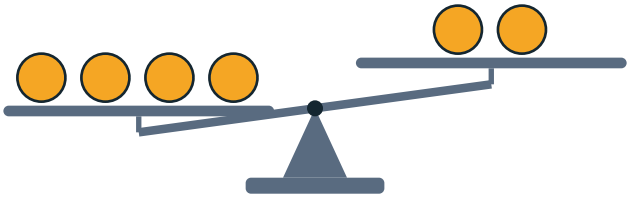
# Balance Puzzles

Kindergarten | 2026-11-01 | Worksheet

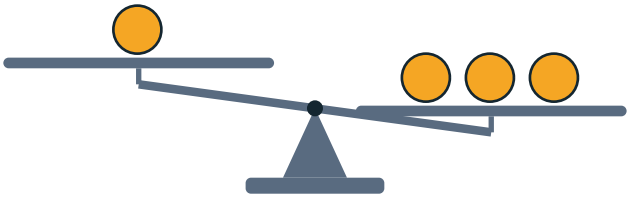
An adult can read this aloud. The lower pan is the heavier one. A level scale has the same weight on both sides.

**All the balls weigh the same. 01–03: circle the heavier pan. 04–06: how many balls must go on the right pan to make it level? Draw them and write the number in the dashed box.**

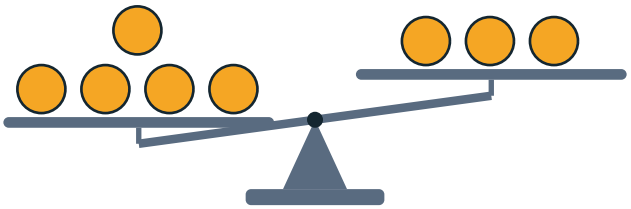
**01**



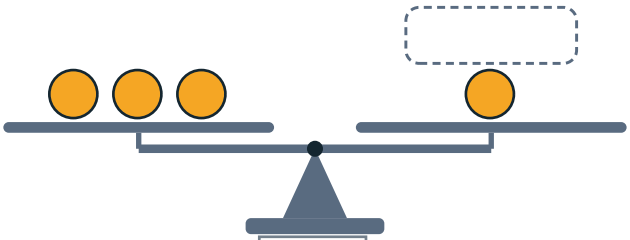
**02**



**03**

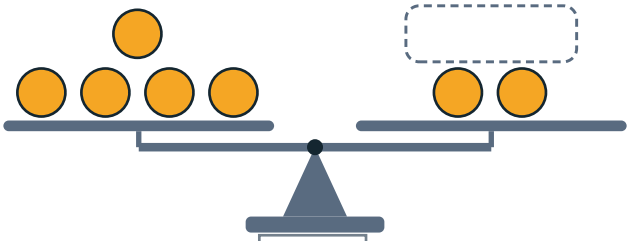


**04**



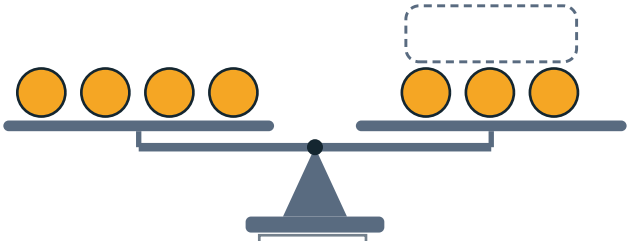
**Balls to add:** ☐

**05**



**Balls to add:** ☐

**06**



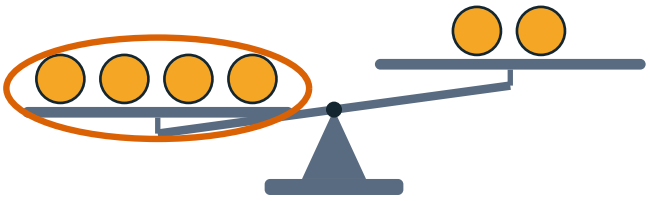
**Balls to add:** ☐

# Balance Puzzles

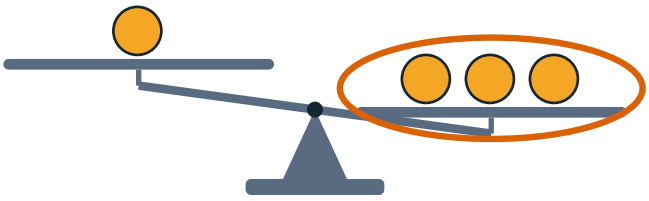
Kindergarten | 2026-11-01 | Answer key

Orange marks show the answers. To check, put the values back on every scale: both pans must give the same total.

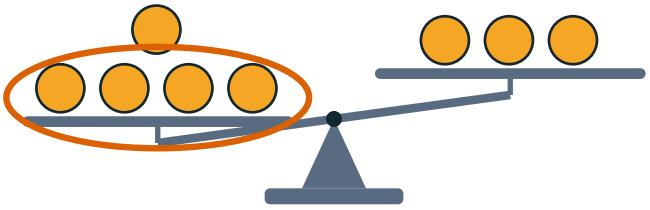
**01**



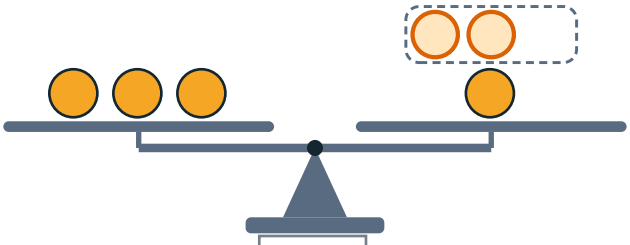
**02**



**03**

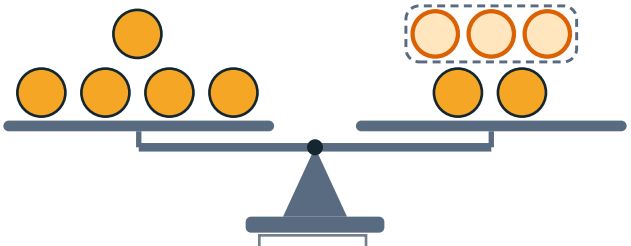


**04**



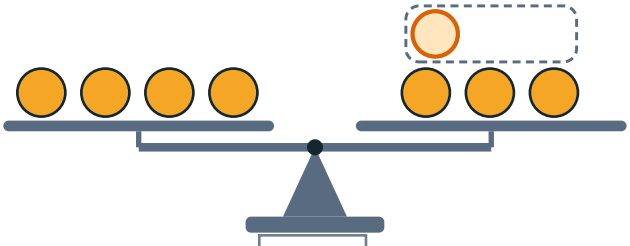
Balls to add: **2**

**05**



Balls to add: **3**

**06**



Balls to add: **1**

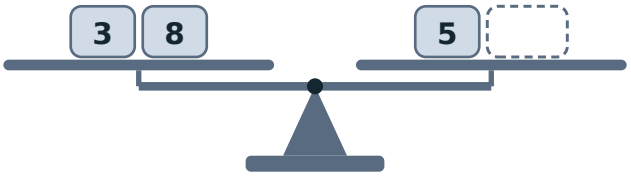
# Balance Puzzles

Grade 1 | 2026-11-01 | Worksheet

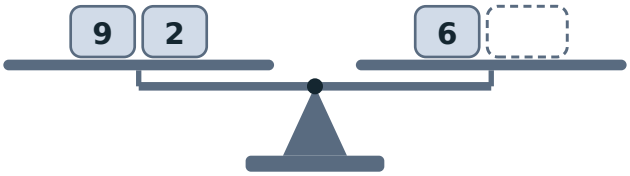
A level scale means the two pans weigh exactly the same. Read each scale like a sentence, use what it tells you, and find every missing weight. In each puzzle, the same shape always has the same weight.

**Both pans add up to the same total. Write the missing number in the dashed block. Check: add each side.**

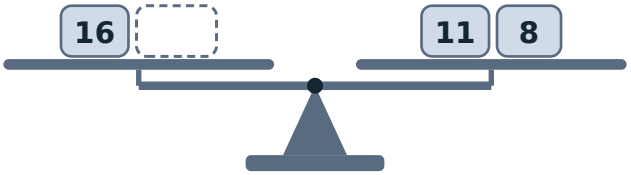
## 01



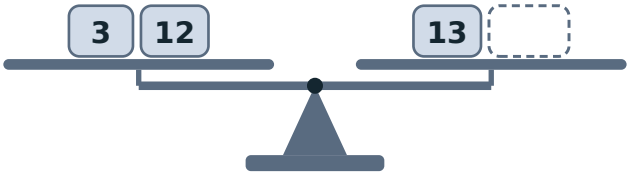

## 02



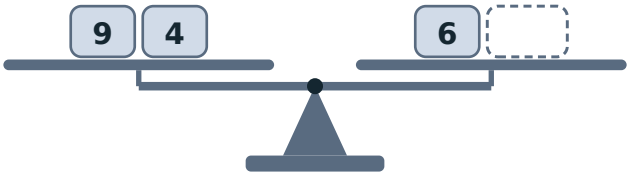

## 03



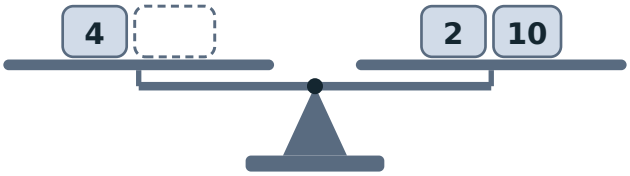

## 04




## 05




## 06

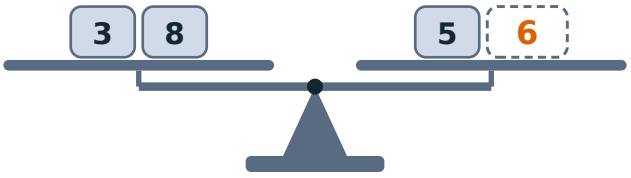


# Balance Puzzles

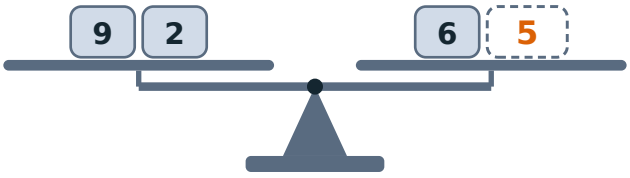
Grade 1 | 2026-11-01 | Answer key

Orange marks show the answers. To check, put the values back on every scale: both pans must give the same total.

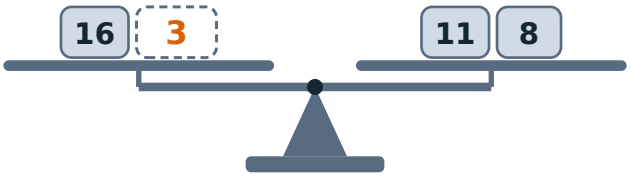
**01**



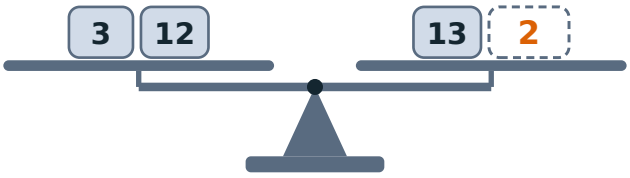

**02**



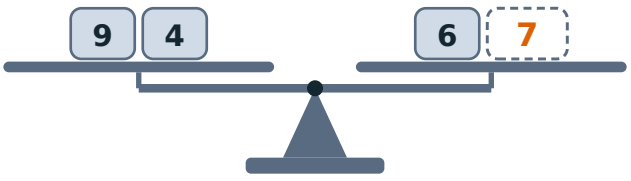

**03**



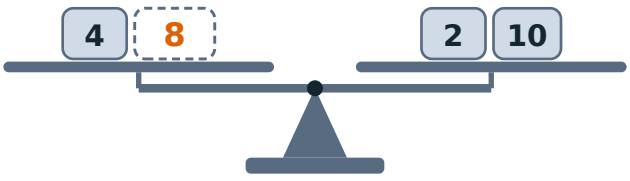

**04**




**05**




**06**



# Balance Puzzles

Grade 2 | 2026-11-01 | Worksheet

A level scale means the two pans weigh exactly the same. Read each scale like a sentence, use what it tells you, and find every missing weight. In each puzzle, the same shape always has the same weight.

**Solve the left scale first, then use that shape on the second scale. Two of the same shape is a doubling fact.**

## 01 Puzzle

▲ = ☐ ● = ☐




## 02 Puzzle

■ = ☐ ★ = ☐




## 03 Puzzle

▲ = ☐ ● = ☐




## 04 Puzzle

■ = ☐ ★ = ☐



# Balance Puzzles

Grade 2 | 2026-11-01 | Answer key

Orange marks show the answers. To check, put the values back on every scale: both pans must give the same total.

## 01 Puzzle

▲ = 8 ● = 20




## 02 Puzzle

■ = 4 ★ = 10




## 03 Puzzle

▲ = 3 ● = 17




## 04 Puzzle

■ = 10 ★ = 18



# Balance Puzzles

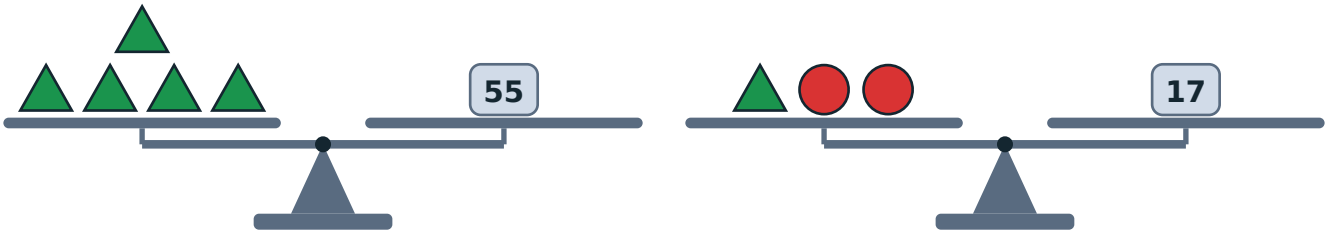
Grade 3 | 2026-11-01 | Worksheet

A level scale means the two pans weigh exactly the same. Read each scale like a sentence, use what it tells you, and find every missing weight. In each puzzle, the same shape always has the same weight.

**First scale: equal shapes are a multiplication fact, so divide. Second scale: take away the shape you know, then share the rest.**

## 01 Puzzle

▲ = ☐ ● = ☐




## 02 Puzzle

■ = ☐ ★ = ☐



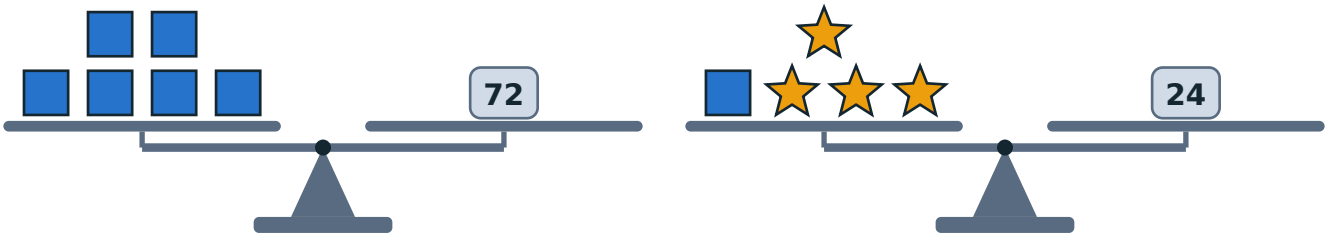

## 03 Puzzle

▲ = ☐ ● = ☐




## 04 Puzzle

■ = ☐ ★ = ☐



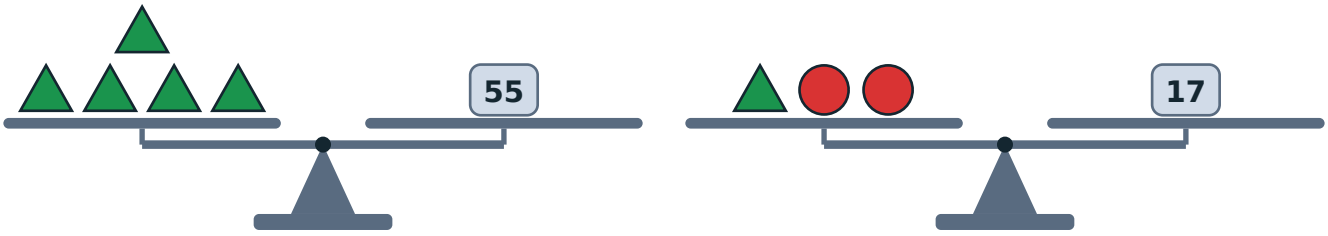
# Balance Puzzles

Grade 3 | 2026-11-01 | Answer key

Orange marks show the answers. To check, put the values back on every scale: both pans must give the same total.

## 01 Puzzle

▲ = 11 ● = 3




## 02 Puzzle

■ = 5 ★ = 9



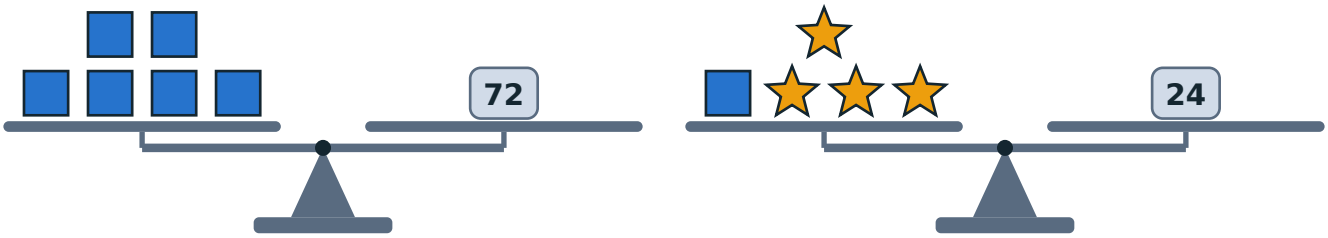

## 03 Puzzle

▲ = 9 ● = 10




## 04 Puzzle

■ = 12 ★ = 3



# Balance Puzzles

Grade 4 | 2026-11-01 | Worksheet

A level scale means the two pans weigh exactly the same. Read each scale like a sentence, use what it tells you, and find every missing weight. In each puzzle, the same shape always has the same weight.

**Shapes can be on both pans. Swap a shape for what it is worth on the other scale, then solve.**

## 01 Puzzle

▲ = ☐ ● = ☐




## 02 Puzzle

■ = ☐ ★ = ☐




## 03 Puzzle

▲ = ☐ ● = ☐




## 04 Puzzle

■ = ☐ ★ = ☐



# Balance Puzzles

Grade 4 | 2026-11-01 | Answer key

Orange marks show the answers. To check, put the values back on every scale: both pans must give the same total.

## 01 Puzzle

▲ = 14 ● = 25




## 02 Puzzle

■ = 25 ★ = 33




## 03 Puzzle

▲ = 80 ● = 40




## 04 Puzzle

■ = 44 ★ = 22



# Balance Puzzles

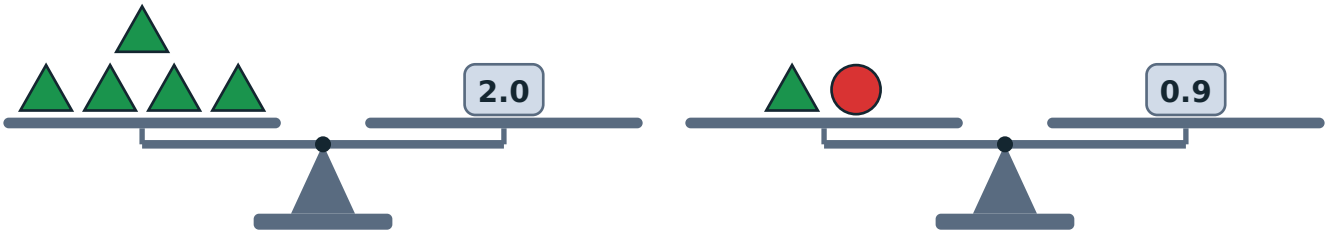
Grade 5 | 2026-11-01 | Worksheet

A level scale means the two pans weigh exactly the same. Read each scale like a sentence, use what it tells you, and find every missing weight. In each puzzle, the same shape always has the same weight.

**Weights are in kilograms to one decimal place. Divide on the first scale, then subtract and divide on the second.**

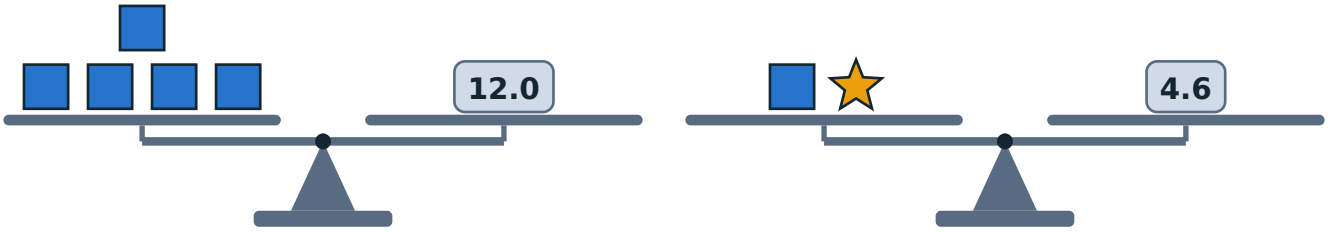
## 01 Puzzle

▲ = ☐ ● = ☐




## 02 Puzzle

■ = ☐ ★ = ☐




## 03 Puzzle

▲ = ☐ ● = ☐




## 04 Puzzle

■ = ☐ ★ = ☐



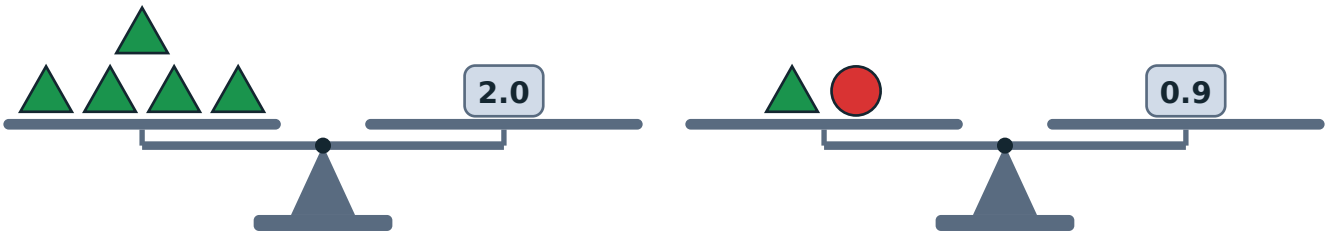
# Balance Puzzles

Grade 5 | 2026-11-01 | Answer key

Orange marks show the answers. To check, put the values back on every scale: both pans must give the same total.

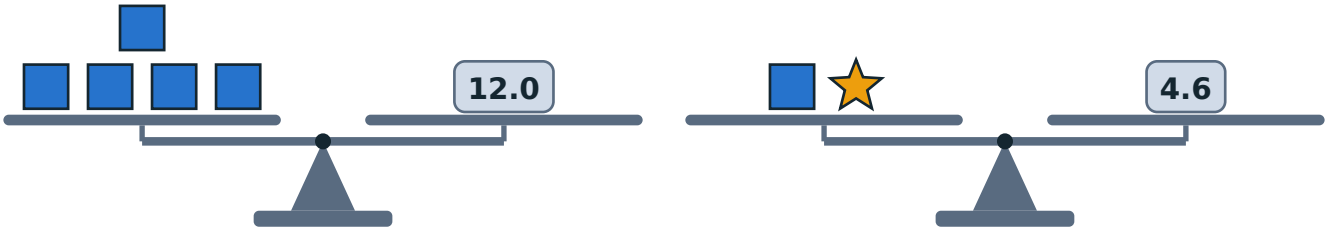
## 01 Puzzle

▲ = 0.4 ● = 0.5




## 02 Puzzle

■ = 2.4 ★ = 2.2




## 03 Puzzle

▲ = 1.6 ● = 0.6




## 04 Puzzle

■ = 1.5 ★ = 0.7



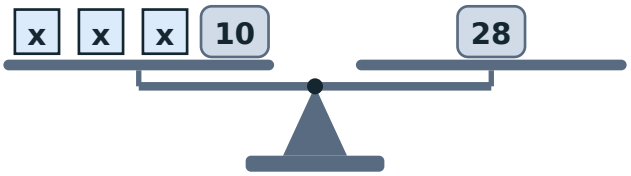
# Balance Puzzles

Grade 6 | 2026-11-01 | Worksheet

A level scale means the two pans weigh exactly the same. Read each scale like a sentence, use what it tells you, and find every missing weight. In each puzzle, the same shape always has the same weight.

**Each box marked x has the same weight. Write the equation the scale shows, then solve it. Example: 2x + 9 = 23, so 2x = 14 and x = 7.**

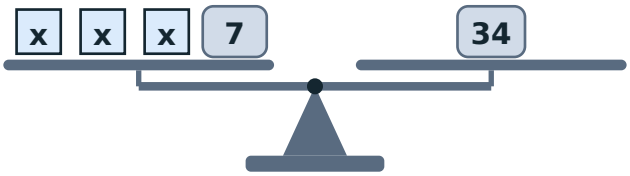
## 01




**Equation:** _____

**x =** ☐

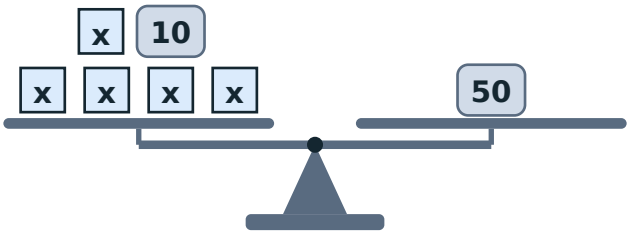
## 02




**Equation:** _____

**x =** ☐

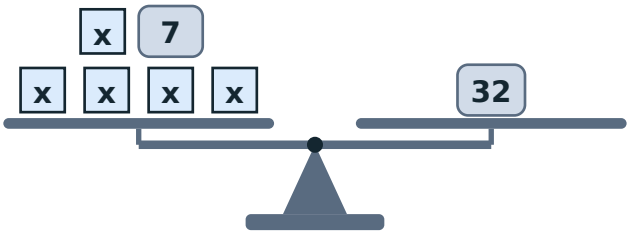
## 03




**Equation:** _____

**x =** ☐

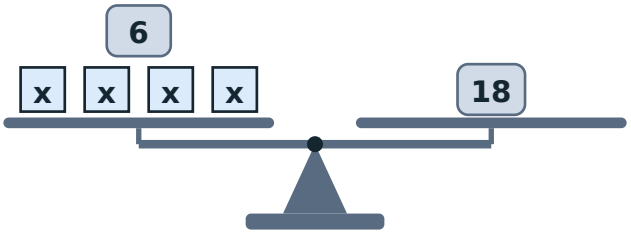
## 04




**Equation:** _____

**x =** ☐

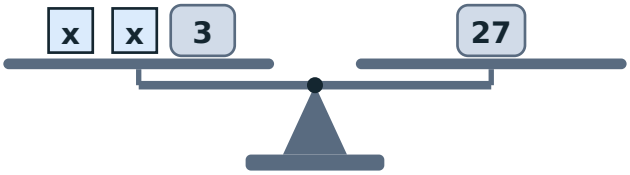
## 05




**Equation:** _____

**x =** ☐

## 06




**Equation:** _____

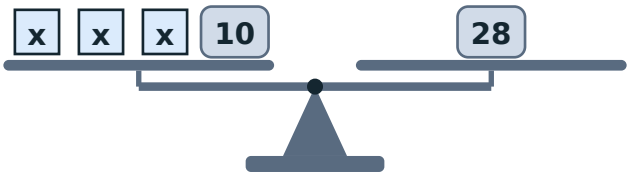
**x =** ☐

# Balance Puzzles

Grade 6 | 2026-11-01 | Answer key

Orange marks show the answers. To check, put the values back on every scale: both pans must give the same total.

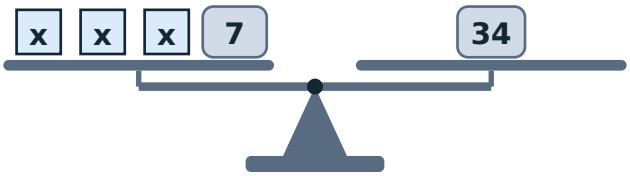
**01**




**Equation:** 3x + 10 = 28

**x =** 6

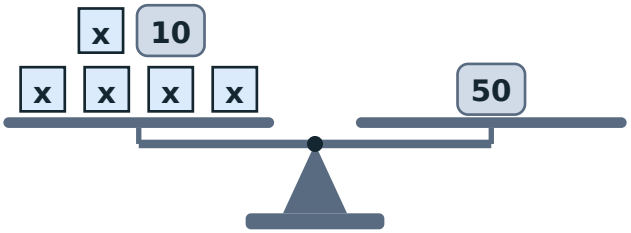
**02**




**Equation:** 3x + 7 = 34

**x =** 9

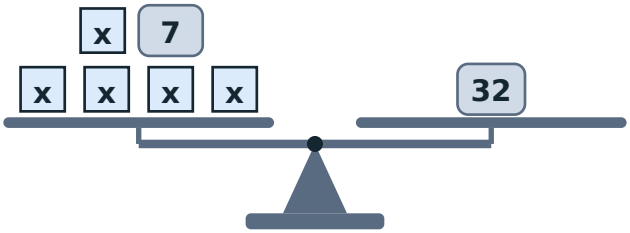
**03**




**Equation:** 5x + 10 = 50

**x =** 8

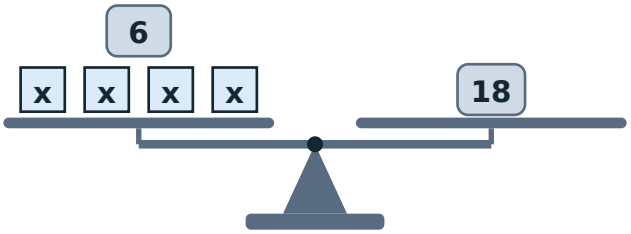
**04**




**Equation:** 5x + 7 = 32

**x =** 5

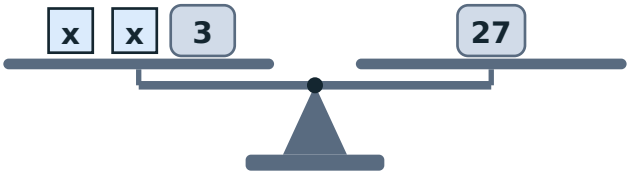
**05**




**Equation:** 4x + 6 = 18

**x =** 3

**06**




**Equation:** 2x + 3 = 27

**x =** 12

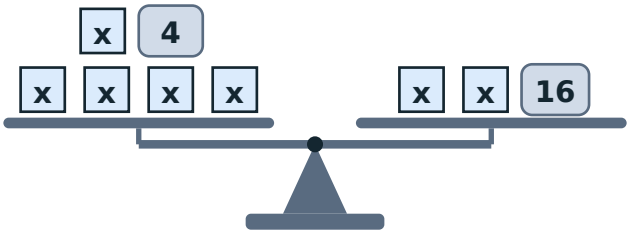
# Balance Puzzles

Grade 7 | 2026-11-01 | Worksheet

A level scale means the two pans weigh exactly the same. Read each scale like a sentence, use what it tells you, and find every missing weight. In each puzzle, the same shape always has the same weight.

**x is on both pans. Take the same thing off both pans until x is alone on one side. Example: 5x + 2 = 3x + 10 gives 2x = 8, x = 4.**

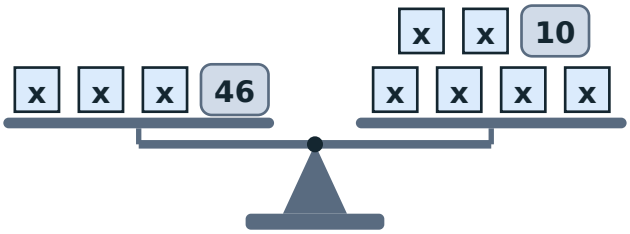
## 01




**Equation:** _____

**x =** ☐

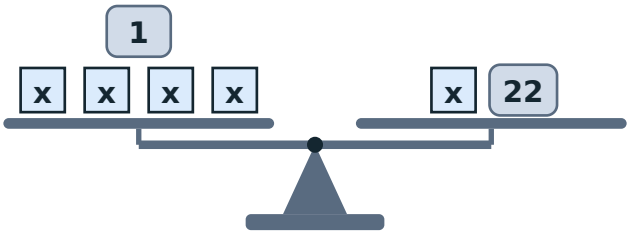
## 02




**Equation:** _____

**x =** ☐

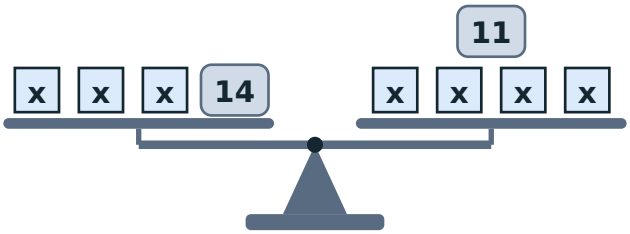
## 03




**Equation:** _____

**x =** ☐

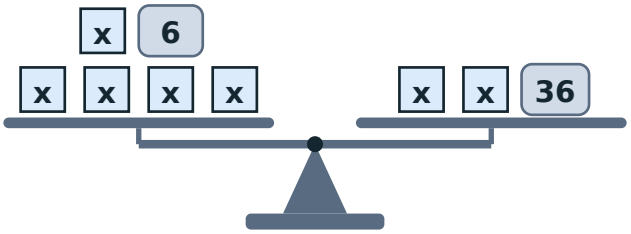
## 04




**Equation:** _____

**x =** ☐

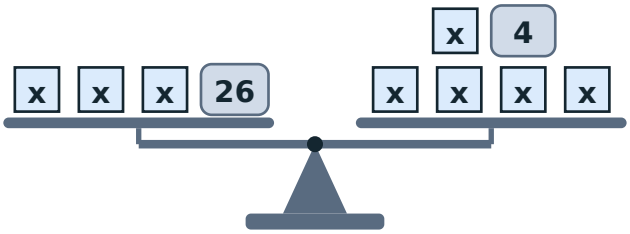
## 05




**Equation:** _____

**x =** ☐

## 06




**Equation:** _____

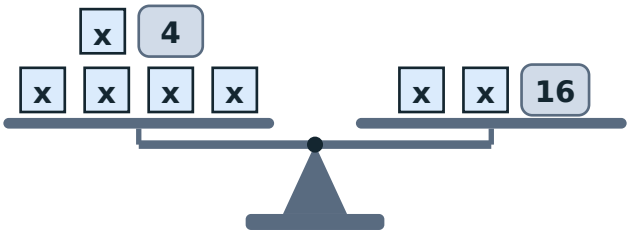
**x =** ☐

# Balance Puzzles

Grade 7 | 2026-11-01 | Answer key

Orange marks show the answers. To check, put the values back on every scale: both pans must give the same total.

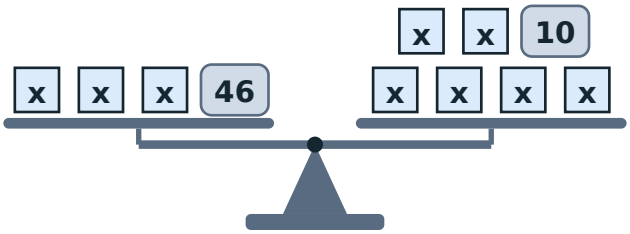
**01**




**Equation:** 5x + 4 = 2x + 16

**x =** 4

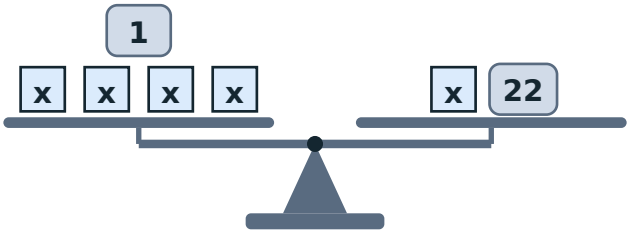
**02**




**Equation:** 3x + 46 = 6x + 10

**x =** 12

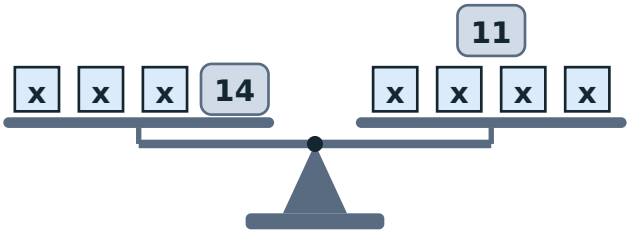
**03**




**Equation:** 4x + 1 = x + 22

**x =** 7

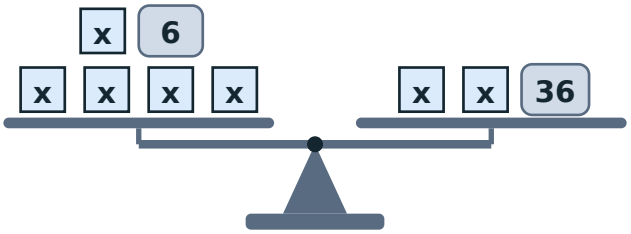
**04**




**Equation:** 3x + 14 = 4x + 11

**x =** 3

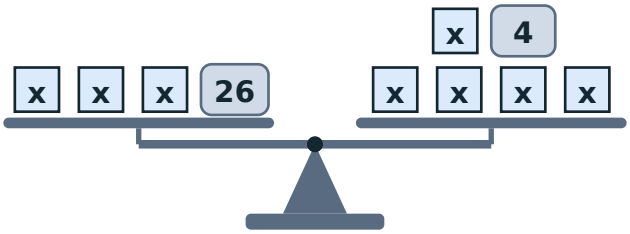
**05**




**Equation:** 5x + 6 = 2x + 36

**x =** 10

**06**




**Equation:** 3x + 26 = 5x + 4

**x =** 11

# Balance Puzzles

Grade 8 | 2026-11-01 | Worksheet

A level scale means the two pans weigh exactly the same. Read each scale like a sentence, use what it tells you, and find every missing weight. In each puzzle, the same shape always has the same weight.

**Write one equation for each scale and solve the system. Puzzle 03 has three unknowns, so it needs all three scales.**

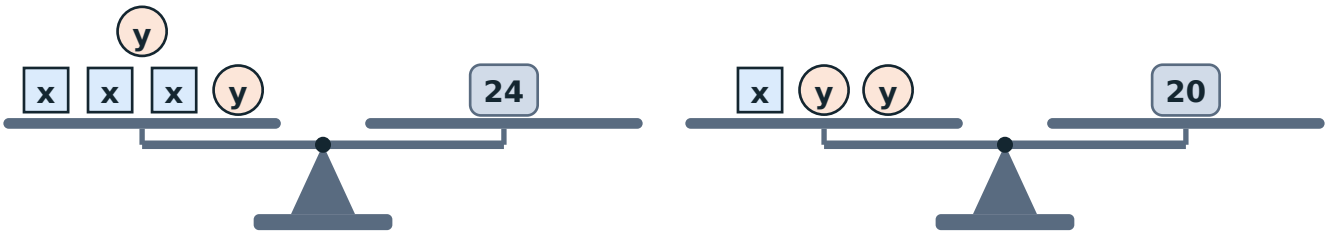
## 01 Puzzle

x = ____ y = ____



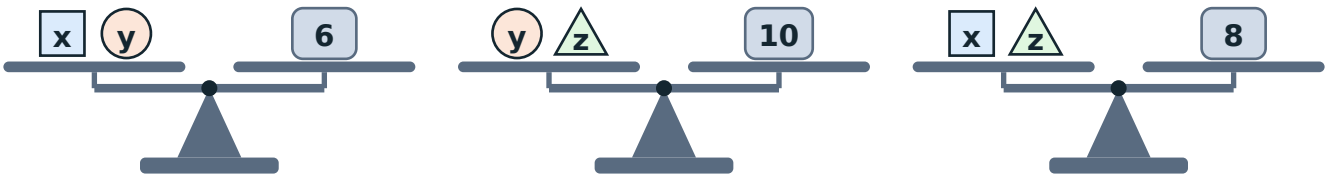

## 02 Puzzle

x = ____ y = ____




## 03 Puzzle

x = ____ y = ____ z = ____



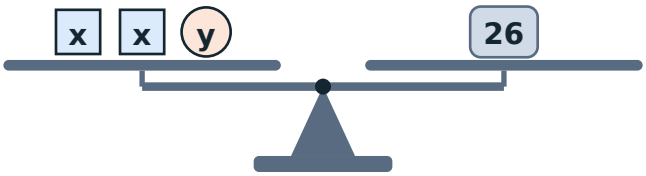
# Balance Puzzles

Grade 8 | 2026-11-01 | Answer key

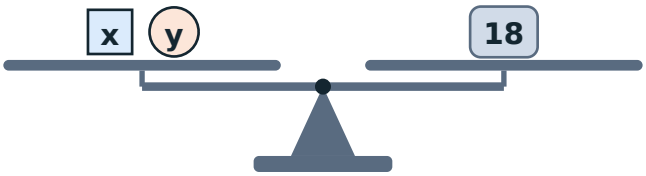
Orange marks show the answers. To check, put the values back on every scale: both pans must give the same total.

## 01 Puzzle

x = 8 y = 10



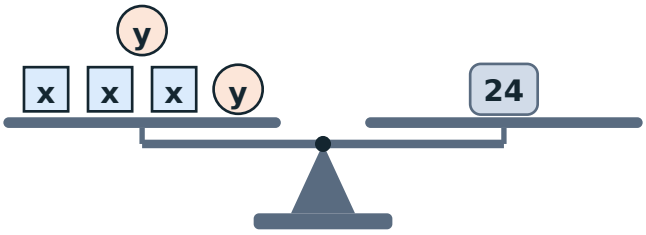

2x + y = 26



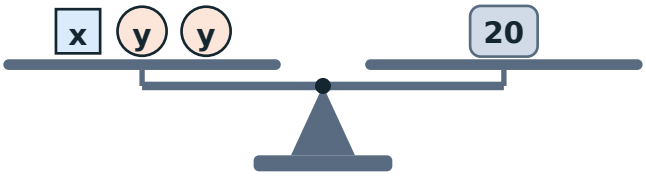

x + y = 18

## 02 Puzzle

x = 2 y = 9



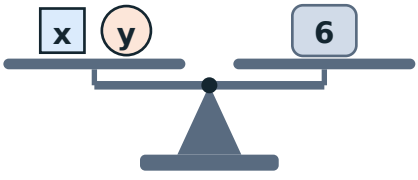

3x + 2y = 24



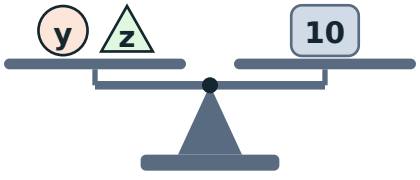

x + 2y = 20

## 03 Puzzle

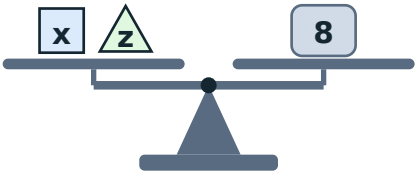
x = 2 y = 4 z = 6




x + y = 6




y + z = 10




x + z = 8