

Lesson 37 **NUMBER**

Subtraction stories: did some leave, or are we comparing?

CURRICULUM ALIGNMENT

ALG.EXP.2 interpret the meaning of symbols or pictures in number sentences.

INTERACTIVES Number Line Jumps · challenge, display, explore

WHAT THIS LESSON TEACHES

Subtraction can tell two kinds of story with the same numbers. Some leave or are used up so the set gets smaller (take-away), or we compare two amounts to find how many more or how far apart (difference).

→ 9 swallows sat on the wire and 4 flew away: $9 - 4 = 5$ (take-away).

→ Niamh has 9 stickers and Cian has 4: $9 - 4 = 5$ (difference, how many more).

MODEL THIS ON THE BOARD

SWALLOWS LEAVE THE WIRE

- 1 Read the story: 9 swallows sat on the wire and 4 flew away.
- 2 Decide the kind: some left, so this is take-away.
- 3 Start at **9** on the number line.
- 4 Jump back **4** because four flew away.
- 5 Land on **5**. Write $9 - 4 = 5$.

LESSON ARC

Open with two stories on 9 and 4 — swallows flying off versus Niamh's and Cian's stickers — and take hands-up on same kind or different. Model take-away as jumps back from 9 on the number-line interactive, then difference as jumps up from 4 to 9. Pupils try three board stories, naming the type before drawing jumps. Copybook writes $9 - 4 = 5$. Class Challenge practises three more. Close on same sentence, two stories.

TEACHING MOVES

1. **Getting Started.** Read Story A and Story B aloud once. Give five seconds of quiet think-time, then take three hands-up answers — do not settle the question. Watch for pupils who call both take-away just because both use 9 and 4; leave that tension for the number line.
2. **Watch and Notice.** On swallows, revoice four jumps back from 9: some left, that is take-away. On stickers, draw five jumps up from 4 to 9 and ask 'did anything go away?' Hold until someone names the two stories as different kinds. Frogs is a quick third take-away to lock the contrast.
3. **Try It Together.** Before each turn, demand the type out loud — take-away or difference — then the pupil sets the start and draws the jumps. If someone starts a difference story on the bigger number and jumps back, accept the landing but name that they counted the gap. About three minutes per story; rotate three pupils.
4. **Write the sentence in your copy.** Leave $9 - 4 = 5$ on the IWB and pause the interactive. Walk the room glancing for a full sentence with $-$ and $=$; this is whole-class copybook practice, not marking. Early finishers may write the sticker story as the same sentence underneath — do not require it.

5. **Class Challenge.** Keep board work brisk: grapes eaten is take-away; team 12 vs visitors 9 is difference; beanbags out is take-away. On $12 - 9$, if a pupil counts nine jumps back, accept the landing then ask whether counting up needed fewer jumps — naming the short path is the check.
6. **What Did We Notice?.** Listen for both meanings: four left the set, and the gap between 9 and 4. Revoice: same sentence, two stories — take-away or difference. If someone only restates the answer 5, nudge: what happened in the story?

COMMON MISCONCEPTIONS

⚠ Pupils treat every subtraction as take-away and always jump back from the bigger number, even on a 'how many more' story.

Freeze on the stickers example. Ask 'did anything leave Niamh's pack?' Point at both amounts on the number line and count the gap up from 4 to 9 so the class sees nothing left the set.

⚠ On a difference story pupils write the smaller number first ($4 - 9$) because they heard the smaller amount before the how-many-more question.

Return to the number line: both amounts already sit on it. Write $9 - 4$ with the class and re-read the story against the sentence so the gap is a positive count.

DIFFERENTIATION

EMERGING

- Stay with the take-away stories first (apples eaten, birds flew off) so pupils only count back before meeting a compare story.
- Pre-mark the start number on the number-line interactive; the pupil draws the jumps and names the landing only.

DEVELOPING

- After a difference story lands, ask: could you have counted back instead? Which path used fewer jumps, and why?
- Under the copybook sentence $9 - 4 = 5$, write both labels in their own words — take-away and difference.

PROFICIENT

- Invent one new take-away story and one new difference story that both match $15 - 6 = 9$, then tell the class which jumps each needs.
- On $12 - 9$, justify out loud why counting up is the shorter path before anyone draws.

✚ **Cross-curricular:** Use the two class roll numbers on the door as a live difference story — how many more pupils are on our roll?

ANSWER KEY

Scaffold: visual check on the page

Q1: 6

Q2: 4

Q3: 5

Q4: 6

Q5: 9

a) Always : That is a take-away story using those exact numbers.

b) Always : That is a difference story using the same numbers.

c) Never : The same numbers can tell either kind of story.

d) Never : The same jump can show a difference comparison too.

EXTENSION SHEET · STRETCH ANSWERS

S1: 2

S2: 12

S3: 5

S4: 1