

Nutrition: reading the label

Lesson at a glance

Hold up one empty drinks can and take finger guesses on hidden teaspoons of sugar before any number is revealed. Model grams $\div$ 4 on the board with neutral practice figures and a real teaspoon of sugar, then drive the sugar-detective interactive so the class predicts and sees everyday drinks revealed. Groups decode three clean empty packs on the Investigation Journal page, convert sugar to teaspoons, and place standouts on two fair class lines (drinks by per 100 ml, snacks by per 100 g) before a short talk on claims versus panel evidence.

Learning objectives

- Read sugar and salt information on food and drink labels
- Convert grams of sugar into teaspoons and rank drinks with drinks and snacks with snacks fairly by sugar using one shared rule

Before the bell: prep

Day before: gather clean dry empties with readable nutrition panels for about six groups (three packs each; mix of drinks and snacks). Prefer packs already showing sugar per 100 ml or per 100 g; print the lesson's label cards (one set per group) if short. Print the Investigation Journal page. Set out granulated sugar, a teaspoon and clear cups. Open the sugar-detective interactive on the IWB.

Materials

Item	Qty	Per	Source	Low-cost substitute
clean empty drinks packaging with readable nutrition labels (mixed everyday brands)	12	class	brought from home	printed photos of real nutrition panels that show sugar per 100 ml (several sets) if empties are scarce
clean empty snack packaging with readable nutrition labels	12	class	brought from home	food cards showing real nutrition panels with per 100 g figures (one set per group)
granulated sugar	1	class	supermarket	a cup of dry rice counted out as 'spoonfuls' for visualisation only (say it stands for sugar)
metal or plastic teaspoon	1	class	classroom	a 5 ml medicine spoon from a basic first-aid kit
small clear cups or saucers for sugar teaspoon piles	4	class	classroom	clean jar lids or small plates
Investigation Journal page	1	pupil	provided printable	ruled paper with a simple results table drawn by the pupil

Safety watch-point

Clean empty packaging only: no tasting or opening. Check food allergies before handling packs that once held allergens. Wipe sugar grains, wash cups and hands; sugar is not for eating in this lesson.

Teaching moves

- **Getting Started:** Hold one clean empty can high so everyone can see it. Take three or four finger guesses only, then park the mystery. Do not hand out packs yet or the later conversion teaching has nothing left to do.
- **How to read a label:** Model once on the board with neutral numbers ($20 \text{ g} \div 4 = 5$ teaspoons), not the opening can. Practise one more (e.g. $12 \text{ g} \rightarrow 3$). Tip five level teaspoons into a clear cup so the class can see it. Name nutrition label, teaspoon of sugar, and fair ranking as each idea appears. Sketch a small carton versus a large bottle once to lock why per 100 ml is fairer than pack totals.
- **Sugar detective:** Run the sugar-detective interactive in guided mode. For each drink, take a prediction, ask higher or lower so the whole class commits, then tap to reveal and convert $\div 4$. After cola or the energy drink, tip the matching teaspoons into a clear cup. Note pack sizes differ; optionally show cola and energy drink per 100 ml so the biggest bottle is not automatically the sugariest. Frame energy drinks as adult products read as label evidence only.
- **Investigate the labels:** Hand out the Investigation Journal page before packs. Model one pack under the visualiser: find sugars and salt, lock drinks = per 100 ml and snacks = per 100 g. Give each group three different empties. Must-finish per pack, one journal column each: name, sugar in the whole pack, teaspoons, fair-unit figure, and a quick salt find. Circulate for units beside every number and no tasting.
- **Rank least to most:** Build two physical lines on a bench or floor: drinks and snacks separate. Restate the locked rules before the first pack is placed. Groups place standouts; fold watchers in with 'Agree? Higher or lower? What number are you using?' Never put a drink next to a snack on one sugar line.
- **Record your findings:** Pupils finish the paper Investigation Journal entries: fair-unit sugar, salt, teaspoons, rank on the correct line, and the rule used. Check $\div 4$ conversions and that ranks match the settled class lines. Fast finishers add one front claim that did not match the panel.
- **Make sense:** Pull three short pieces of evidence: highest drinks on the per 100 ml line, highest snacks on the per 100 g line, one salt notice, and one mismatched front claim if starred. One sentence on Ireland's sugar tax on sweetened drinks as a real-world link; keep the talk on the numbers gathered, not a long tax debate.

What it should show

Water sits at zero sugar; soft drinks and many snack bars rank high on sugar; savoury snacks often stand out for salt. Teaspoons $\approx$ grams $\div 4$ (cola ~ 9 , energy drink ~ 14 per pack). Per 100 ml order can differ from whole-pack order: cola and energy drink are close per 100 ml despite different bottle sizes. Figures vary by brand; trust the pack in hand. A surprising low rank usually means the group used pack total instead of the fair unit.



Misconceptions & interventions

- **‘It says fruit / natural / 5-a-day on the front, so it can’t have much sugar.’** Point back to the nutrition panel on the pack or the board reveal: juice and smoothies can carry high free sugar even when fruit is real. Both the claim and the high number can be true: the panel is the evidence.
- **Pupils rank a huge bottle above a small carton using total sugar only, or mix drinks and snacks on one line.** Hold up different pack sizes and restate the locked rules: drinks by sugar per 100 ml, snacks by sugar per 100 g, two separate lines. Ask which number they are using before any pack is placed.
- **‘Milk has sugar so it is as bad as cola.’** Name lactose as milk’s natural sugar and contrast it with free sugars in soft drinks. Keep the daily-max talk on free sugars; milk still belongs on the fair drinks line by its per 100 ml figure.

Differentiation

Emerging	Developing	Proficient
• Pre-highlight the sugars and per 100 lines with a sticky note, or give photo panels with larger print; sit with the teacher table for the first $\div 4$ conversion.	• After recording, check whether whole-pack order would differ from the per 100 order for one drink they already decoded.	• Add one journal sentence on a front claim that did not match the panel, or briefly compare sugar and salt order for the top items on each line.

Cross-curricular hook

Link to Maths measures and data: convert grams to teaspoons ($\div 4$) and order items using one shared unit per line.

