

Lesson 1 · living-things

The Systems of the Human Body

Lesson at a glance

Open by having pupils press a hand to their chest, feel nothing much, then run on the spot and feel the heartbeat — what's working inside? Walk the class through a five-team table (Breathing, Circulation, Digestion, Movement, Control), then groups sort eleven printed organ cards onto five team-mats by the JOB each does. Check the trickiest cards on the IWB sorting-tree, pass an oxygen 'job' along the lined-up mats, and record organs-by-team plus one dependency arrow in the Investigation Journal.

Learning objectives

- Group the body's organs by the system (team) whose job they share
- Explain how the body's systems depend on one another to keep us alive

Before the bell – prep

Print and cut one full set of eleven organ cards (lungs, windpipe, heart, blood vessels, stomach, small intestine, liver, brain, nerves, bones, muscles) and the five team-mat header cards per group of three or four — laminate if you can reuse them. Print the five-box Investigation Journal page per pupil. Load the IWB sorting-tree (explore mode) and the systems table beforehand.

Materials

Item	Qty	Per	Source	Low-cost substitute
organ cut-out cards (lungs, windpipe, heart, blood vessels, stomach, small intestine, liver, brain, nerves, bones, muscles)	1	group	classroom	show one set on the IWB and sort as a whole class
A4 team-mat header cards (Breathing, Circulation, Digestion, Movement, Control)	1	group	classroom	write the five team names on five plain sheets
Investigation Journal page (five labelled team boxes with space for a dependency arrow)	1	pupil	classroom	plain A4 paper with the five team names written in five boxes



Safety watch-point

Keep the run-on-the-spot in Getting Started to a few seconds with space around each pupil; remind anyone who feels dizzy to stop and sit.



Teaching moves

- **Meet the Body's Teams:** Display the table and read it one row at a time, pointing to roughly where each team works on your own body. Say the bracketed plain words (windpipe, blood vessels, small intestine) aloud as you reach them. End by saying the rule clearly — it is NOT on the pupils' screen: 'We sort each organ by the JOB its team does, not by where it sits.' Pre-empt the chest-grouping error: 'The heart and lungs are neighbours but on different teams.'
- **Sort the Organs onto the Team Mats:** Hand each group the card set and five mats. Circulate and listen for reasoning — this is your formative check for grouping-by-job. When you see the heart placed on the Breathing mat (it will happen), prompt 'What is the heart's job — pumping or breathing?' In the last minute, ask each group to hold up the single organ they found trickiest; jot the two or three that come up most to lead the board check.
- **Check It on the Board:** Drive the IWB sorting-tree in explore mode. Start with the two or three trickiest organs you gathered. Send each one to a different group to place and justify the job, then fold in the room: 'Are they right? Thumbs up if your group agreed.' Keep the whole class judging, not just the group at the board.
- **Pass the Job Along:** Lay the five mats in a row. Physically walk one breath of oxygen along: touch Breathing, then Circulation, then Movement as you narrate each part. Give pupils a few seconds to turn and tell a neighbour before taking answers. Draw out the second objective: 'If the breathing team stopped, circulation has no oxygen to carry and movement can't run.'
- **Record the Teams and Their Organs:** Hand out the five-box journal page. Pupils write each organ into the correct team box, then draw and label ONE arrow between two boxes showing a dependency. Stress this matches the team-mats — grouped by job, not place. If time is short, the organs-in-boxes plus one arrow are the priority.



What it should show

Pupils should land lungs+windpipe on Breathing, heart+blood vessels on Circulation, stomach+small intestine+liver on Digestion, bones+muscles on Movement, brain+nerves on Control. The classic 'wrong' answer is the heart on the Breathing mat — it isn't confusion about the heart's job, it's grouping by location (heart near lungs). Redirect by asking for the job, not the place. Liver also strays; affirm it's part of the digestion team.



Misconceptions & interventions

- "The heart goes on the Breathing team because it's right next to the lungs." — Catch it as you circulate or at the board check. Ask 'What is the heart's job — pumping or breathing?' Re-voice the rule: neighbours can be on different teams because they do different jobs, and move the heart to Circulation together.
- "Each team works on its own and doesn't need the others." — Use the lined-up mats in Pass the Job Along — walk the oxygen along and pause: 'If Breathing stopped, what would Circulation have to carry?' The gap makes the dependency visible, then they draw it as their journal arrow.

Differentiation

Emerging	Developing	Proficient
<ul style="list-style-type: none"> • Hand the organ cards three at a time rather than all eleven at once, and let them copy organs into the journal boxes straight from their team-mats. 	<ul style="list-style-type: none"> • Ask the group to add an extra organ of their own (skin? kidneys?) and argue aloud which team it should join. 	<ul style="list-style-type: none"> • Challenge them to draw a second dependency arrow in the journal and explain a chain across three teams, e.g. Breathing → Circulation → Movement.

Cross-curricular hook

Link to SPHE 'Myself' — knowing the body's systems supports talk about staying healthy, like why we breathe harder when we run.