

GRADE 5 TEACHER RESOURCE: ANSWER KEYS

- 5–A Anatomy: My Heart’s Electrical System (worksheet)
- 5–E Nutrition: “Vitamin Fill-in-the-Blank” (worksheet)
- 5–F Nutrition: “Mineral Fill-in-the-Blank” (worksheet)
- 5–G Nutrition: “Vitamin Crossword Puzzle” (worksheet)
- 5–H Nutrition: “Mineral Crossword Puzzle” (worksheet)

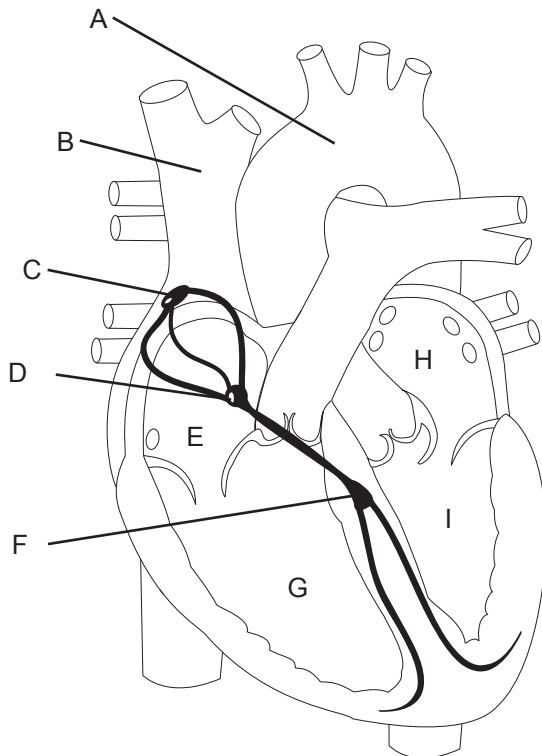
Project Heart

Activities for the Classroom

Identify each labelled part of the heart. In the corresponding blank, define its function.

ANATOMY ANSWER KEY

MY HEART'S ELECTRICAL SYSTEM



Identify:

- A. Aorta
- B. Superior vena cava
- C. Sinoatrial node
- D. Atrioventricular node
- E. Right atrium
- F. Bundle of His
- G. Right ventricle
- H. Left atrium
- I. Left ventricle

Define:

- A. Largest artery, carries oxygenated blood to body
- B. Where oxygen-poor blood from the upper body returns to the heart.
- C. Small group of neural cells in upper right atrium, sends electrical impulses causing the heart to beat
- D. Determines when ventricle needs to contract
- E. Chamber that collects oxygen-poor blood returning from body
- F. Path of neutral connective tissue that conduction impulses travel from the AV node
- G. Chamber that collects oxygen-poor blood from right atrium and pushes it through the pulmonary valve and into the lungs
- H. Chamber that collects oxygen-rich blood from lungs
- I. Largest, strongest chamber that collects oxygen-rich blood from the left atrium and pushes it through the aorta and to the rest of the body.

Use your Vitamin Dictionary to help you complete these sentences.

NUTRITION ANSWER KEY

FILL-IN-THE-BLANK: VITAMINS

1. A, D, E, and K are fat * soluble vitamins; the body can store them so they do not need to be replenished every day.
2. Vitamins * are substances that contain carbon and come from living things.
3. Vitamin B is usually referred to as B complex because there are eight (8) *B different B vitamins.
4. B and C are water * soluble vitamins; the body does not store them and they must be replenished each day.
5. Vitamin A can be made by the body from beta-carotene found in brightly colored fruits and vegetables such as carrots, cantaloupe, and sweet potatoes.
6. Vitamin A is important for maintaining healthy vision so we can react to changes in light and distinguish between different colors.
7. Vitamin B can be found in enriched bread products and whole grains. It helps the body produce energy from carbohydrates.
8. Good sources of vitamin D are the sun, fortified milk, cod liver oil, eggs, or salmon.
9. The B complex * vitamins have many roles in the body; two of the most important roles are to help produce energy from carbohydrates and break down fats and proteins.
10. Vitamin C can be found in citrus fruits, potatoes, strawberries, tomatoes, kiwi, broccoli, spinach, and other leafy greens.
11. Vitamin K is needed for blood clotting * and good sources are green leafy vegetables, vegetable oils such as soybean and canola, and green tea.
12. Vitamin D helps the body maintain calcium and phosphorous (minerals) at healthy levels to help the nervous and immune systems.

Use your Mineral Dictionary to help you complete these sentences.

NUTRITION ANSWER KEY

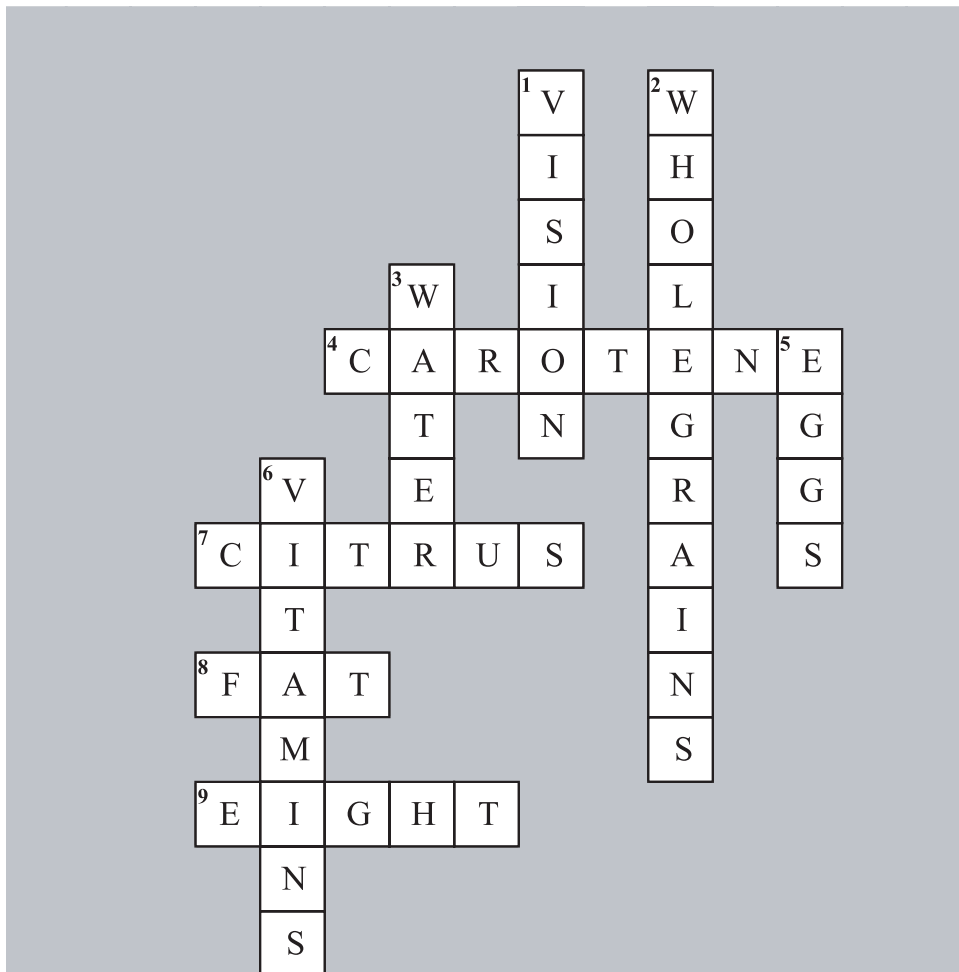
FILL-IN-THE-BLANK: MINERALS

1. Calcium is the most abundant mineral in the body and it's vital for building strong teeth.
2. Red meat and beans are good sources for zinc, an abundant trace mineral that helps the immune system.
3. Too little iron can cause anemia but too much can cause problems too.
4. Table salt can be plain, or with iodine, a micromineral.
5. Legumes, pumpkins, and avocados all contain magnesium, a major mineral especially important to the heart.
6. A partner with calcium, phosphorus reduces muscle pain after vigorous exercise.
7. The macromineral called salt, sodium, or sodium chloride helps to regulate fluids, including blood volume.
8. Good sources of potassium are fresh fruits and dried fruits as well as green leafy vegetables.
9. Microminerals (also called trace minerals) are necessary for the body but in smaller amounts.
10. Foods can be fortified to ensure they provide adequate levels of essential nutrients.
11. Public drinking water and toothpaste contain fluoride to help prevent cavities even though it is not an essential mineral.
12. A goiter is an inflammation of the thyroid gland that can be caused by a lack of iodine in the diet.

Use your Vitamin Dictionary to help you solve the puzzle.

NUTRITION ANSWER KEY

CROSSWORD PUZZLE: VITAMINS



Across

- 4 Vitamin A can be made by the body from beta-_____.
- 7 Vitamin C can be found in _____ fruits.
- 8 A, D, E, and K are _____ - soluble vitamins that the body can store.
- 9 The B complex contains _____ different vitamins.

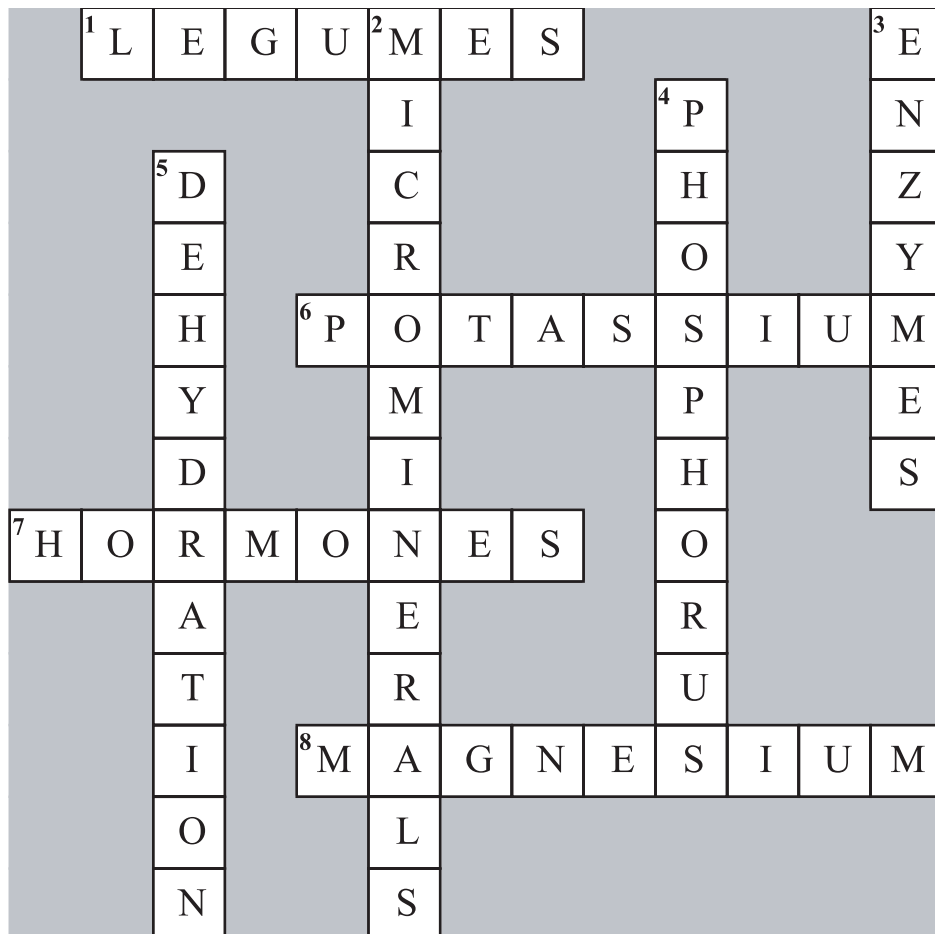
Down

- 1 Vitamin A is important for maintaining healthy _____.
- 2 A good source of vitamin B (two words).
- 3 B and C are _____ - soluble vitamins that the body must replenish each day.
- 5 A good source of vitamin D.
- 6 Substances that contain carbon and come from living things.

Use your Mineral Dictionary to help you solve the puzzle.

NUTRITION ANSWER KEY

CROSSWORD PUZZLE: MINERALS



Across

- Good sources of magnesium that help the heart maintain a natural rhythm.
- This mineral is found in bananas and green leafy vegetables
- Iodine is essential for producing _____.
- A lack of _____ can cause irritability, muscle spasms, and abnormal heart rhythms.

Down

- Flouride, iodine, iron and zinc.
- Complex proteins that act on other chemicals in the body to speed up processes like digestion.
- This abundant mineral helps the kidneys to filter waste.
- Too little sodium can lead to this fluid imbalance.