

Computing Assessment: Coding Basics

Learning objective: To understand algorithms, debugging, and how to sequence instructions.

Read each question carefully. Use the word bank to help you with your answers. Write your answers in the spaces provided.

Kit the fox is building a computer program to help his friends. An algorithm is a set of instructions to complete a task. Sometimes, the code has a mistake. This is called a bug. When Kit finds the mistake and fixes it, he is debugging.

Word bank: Algorithm · Bug · Debug · Sequence · Code

1. 1. Kit wants to write a list of steps to make a sandwich. What is the special name for a set of instructions? (1 mark) (1 mark)

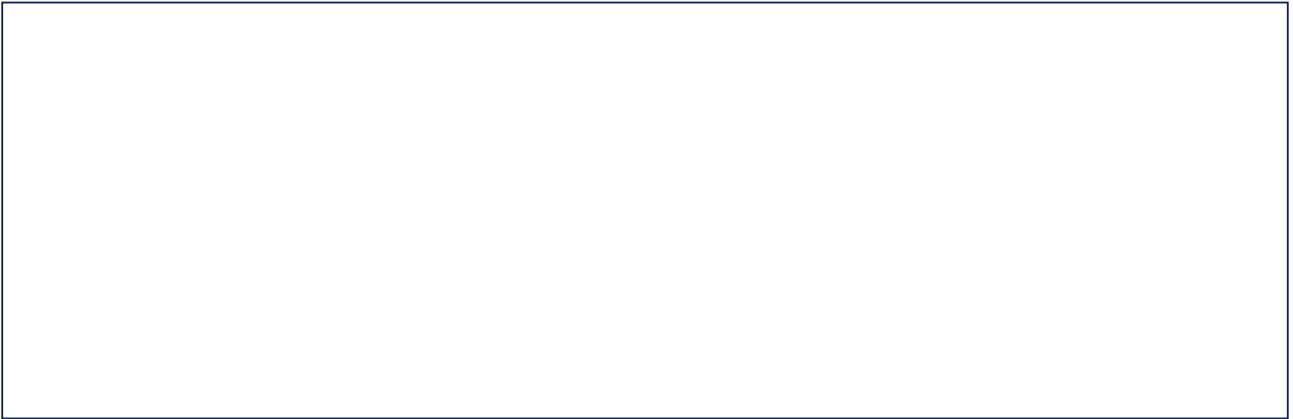
2. 2. What do we call a mistake in a computer program? (2 marks) (2 marks)

3. 3. Explain what it means to 'debug' a program. Use a full sentence. (3 marks) (3 marks)

4. 4. Kit has these instructions for moving a robot: 1. Move forward, 2. Turn left, 3. Jump. Why is the order of these instructions important? (4 marks) (4 marks)

5. 5. Imagine you are teaching a robot how to brush its teeth. Write a list of 5 steps to complete this task. (5 marks) (5 marks)

Draw: Draw a simple path for a robot. Draw an arrow to show the direction the robot must move to reach the finish line.



Extension challenge: Write a short story about a time you had to fix a mistake. How did you feel when you solved the problem? (Total: /25)