CODE/BREAK

UNPLUGGED

Root's friend Square is **hiding,** and we need your help to find them! Square has been sending us clues in the form of **code** and **puzzles.** Use your programming and math skills to crack the codes, collect answers, decode the mystery and **find Square**!

You'll Need: This activity packet and a pen or pencil.
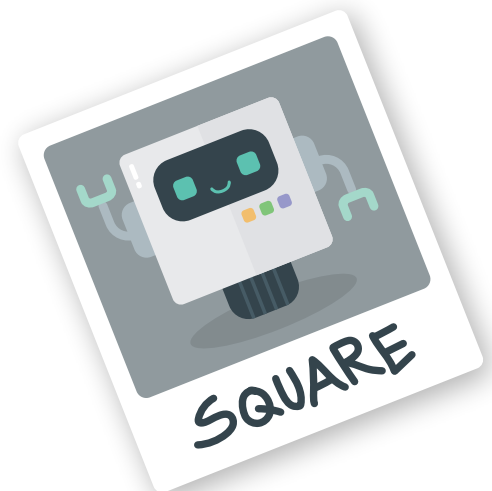
Ideal for Grades 1-4

Name: _____

Grades 1-4

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SQUARE

iRobot Education

Secret Decoder

To decode the message below, fill in the letter above the Code Block that would tell Root to do what is happening in each picture.

I	R	H	S	G	T

D	O	E	C	L	K

Code #1

___ ___ ___

Cause & Effect

Turn Blocks code Root to turn to the right or the left.

Circle the missing picture to make the code blocks match Root's path.

1.

2.

3.

Q   S

4.

A   W

5.

K   N
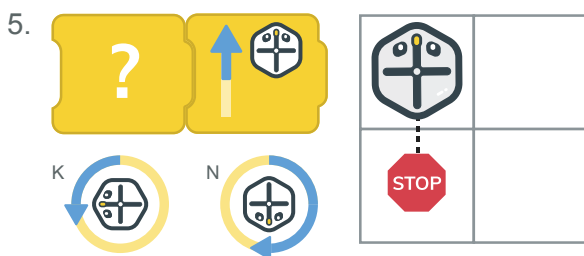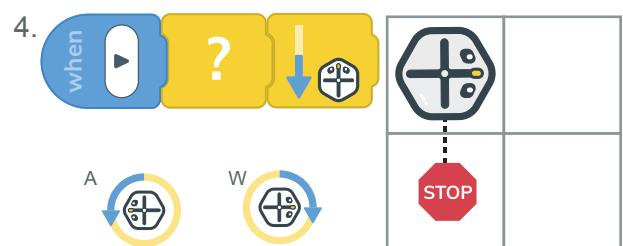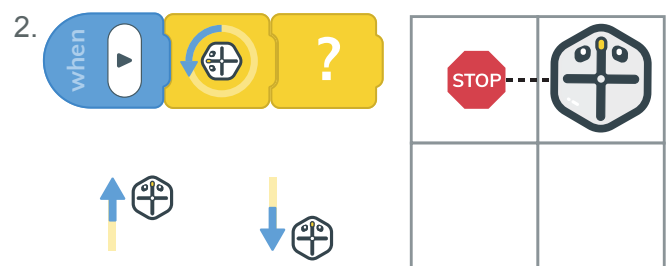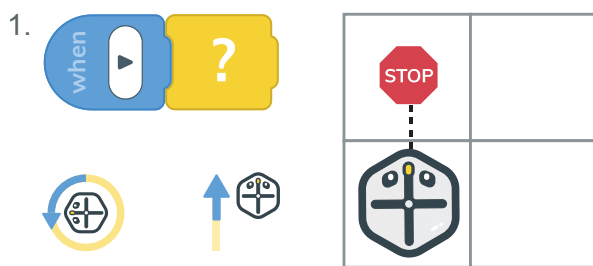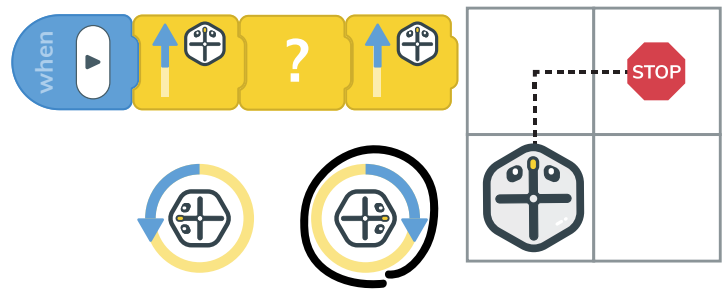
All done? Nice work! Next, write the letters next to the pictures you circled into the number spaces below.
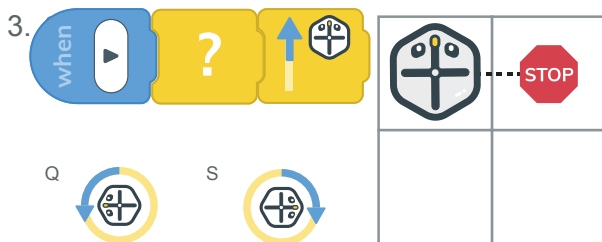
🔑

Code #2

___ ___ ___

Have you found the letters? Turn to page 6 to write the code in the spaces beside Code #2.

Robot Dots

Root can draw while it drives when you use the Marker Block!

Connect the dots to see what Root is trying to say, then follow the directions below!

Which word was Root spelling with dots? Circle the correct word and then write its bold letters in the Code Key.

F R A. *"hello"*   **K I F**. *"perfect"*   **J L D**. *"my name is Root"*

Code #3

___ ___ ___

iRobot

Read the clues to learn which pattern Root is about to drive across.
Use the grids to help keep track of what each clue tells you about the pattern.

Line 1 is **not** red, green or blue. ⟶

Line 2 is **not** red or green, and it ⟶
does not match Line 1.

(Circle) the correct color pattern.

	🔴	🟢	🔵	⚫
Line 1	✗	✗	✗	✓
Line 2	✗	✗	✓	✗

A J O **N**

Line 1 is **not** green or black.

Line 2 is the only red line.

	🔴	🟢	🔵	⚫
Line 1		✗		✗
Line 2	✓	✗	✗	✗

G M C C

---

*Hint: There is **NO GREEN** in this pattern.*

Line 1 is **not** red.

Line 2 matches Line 1 and is **not** black.
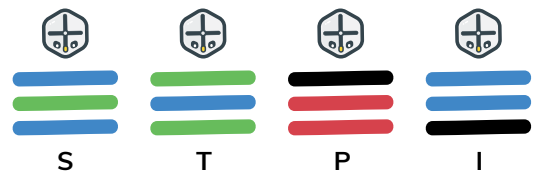
Line 3 is not red and does not match Line 2.

	🔴	🟢	🔵	⚫
Line 1		✗		
Line 2		✗		
Line 3		✗		

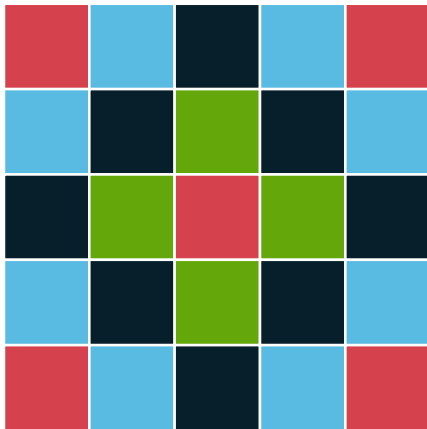S T P I

🔑

Code #4

___ ___ ___

Robot Vision

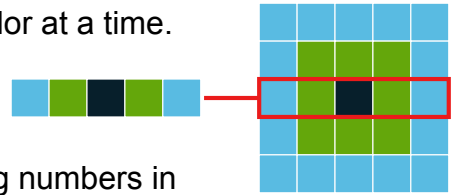With its Color Sensor, the Root Robot can see 1 ROW of color at a time.
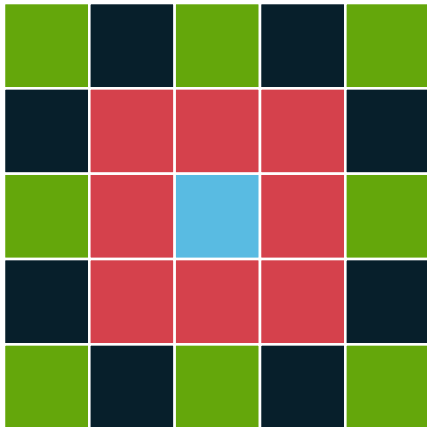
MATCH the rows to their pictures.
There will be one row left over.

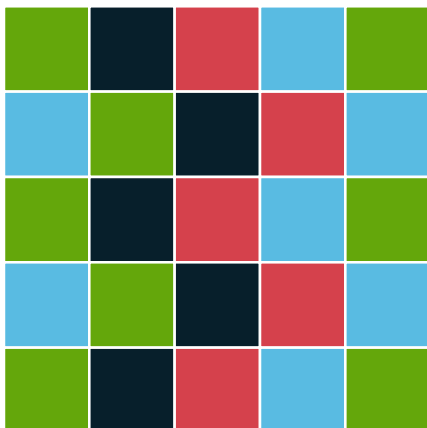When you are finished, write the letters above their matching numbers in the Code Key box.

1

Write Letter Here!

Code #5

___ ___ ___
1   2   3

Have you found the letters? Turn to page 6 to write the code in the spaces beside Code #5.

2

C

B

3

O

S

Crack the Code!

To figure out where Root's friend Square is hiding, you must solve the puzzles on **pages 2-5**.

When you complete each puzzle, write the letters in the correct spaces below.

Code #1: ⎯⎯ ⎯⎯ ⎯⎯

Code #2: ⎯⎯ ⎯⎯ ⎯⎯

Code #3: ⎯⎯ ⎯⎯ ⎯⎯

Code #4: ⎯⎯ ⎯⎯ ⎯⎯

Code #5: ⎯⎯ ⎯⎯ ⎯⎯

Once you have all the letter spaces filled above, it's time to crack the code!
Starting with the 5 spaces next to "Code 1," fill in the spaces below from left to right.

Where is Square hiding?

__ __ __ ,   __ __ __   __ __ __ __ __ __ __ __ __!

Code #1