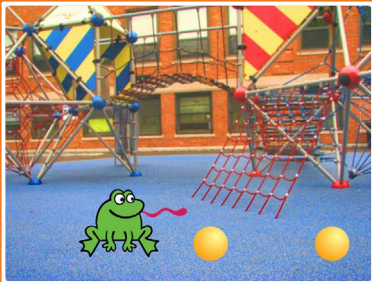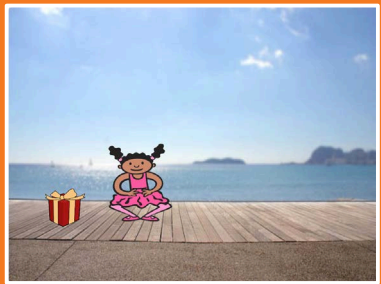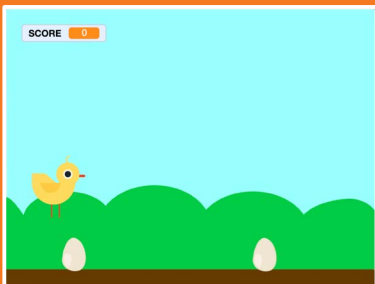# Jumping Game Cards

Make a character jump over moving obstacles.
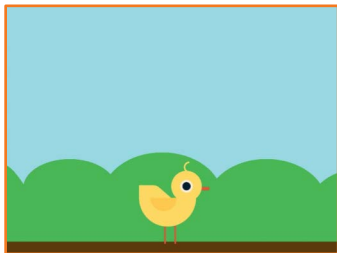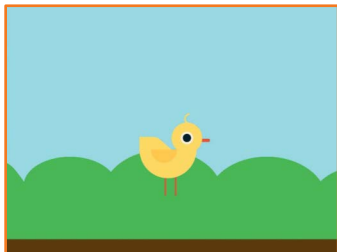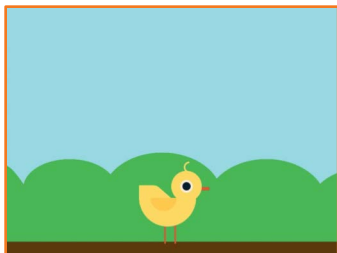
Jumping Game Cards

Use these cards in this order:

1. **Jump**
2. **Go to Start**
3. **Moving Obstacle**
4. **Add a Sound**
5. **Stop the Game**
6. **Add More Obstacles**
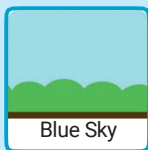7. **Score**

Jump

Make a character jump.

scratch

Jump

GET READY

Choose a backdrop.

Blue Sky

Choose a character, like Chick.

Chick

ADD THIS CODE

Chick

```
when space ▼ key pressed
repeat 10
    change y by 10
repeat 10
    change y by -10
```
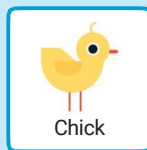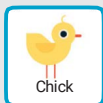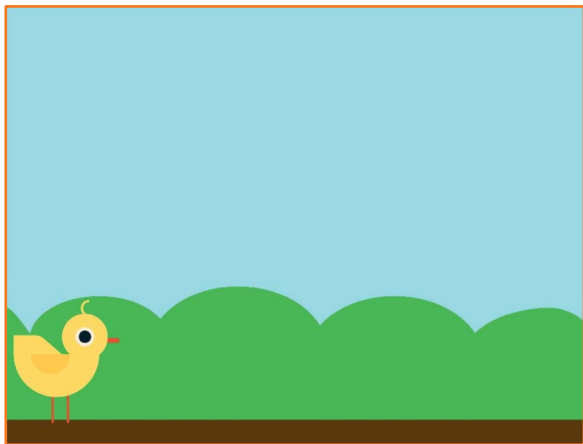
Type a minus sign to go back down.

TRY IT

C V Б N M

Press the **space** key on your keyboard.

Go to Start

Set the starting point for your sprite.

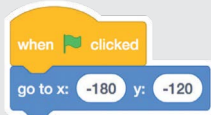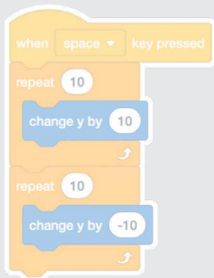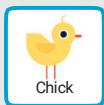SCRATCH

Go to Start

GET READY
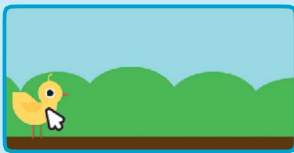
Drag your character to where you want it.

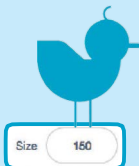When you move your character, its **x** and **y** position will update in the blocks palette.

Now when you drag out a **go to** block, it will set to your character's new position.

ADD THIS CODE

Chick

```
when space ▾ key pressed
repeat 10
    change y by 10
repeat 10
    change y by -10
```

```
when 🏳 clicked
go to x: -180 y: -120
```

Set the starting position.
(Your numbers may be different.)

TIP

| Sprite | Chick | x | -36 |

| ⊙ | ∅ | Size | 100 | Direction |

Size 50

Size 100

Size 150
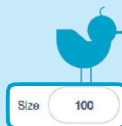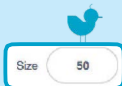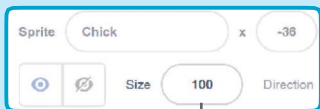
Change the size of a sprite by typing a smaller or larger number.

Moving Obstacle

Make an obstacle move across the Stage.

Moving Obstacle

GET READY

Choose a sprite to be an obstacle, such as **Egg**.

Egg

ADD THIS CODE

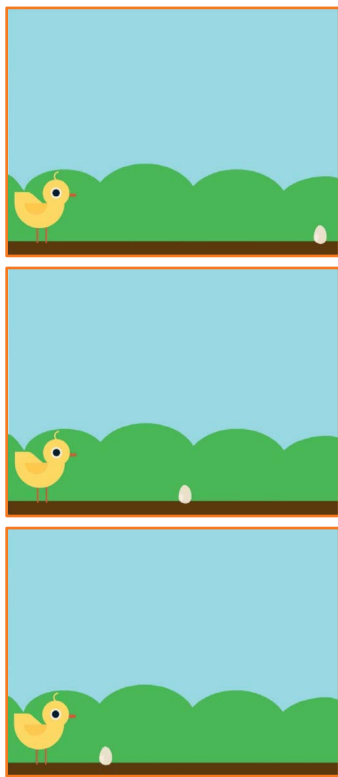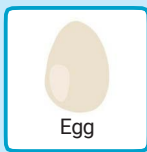Egg

```
when 🚩 clicked
forever
  go to x: 240 y: -145
  glide 3 secs to x: -240 y: -145
```
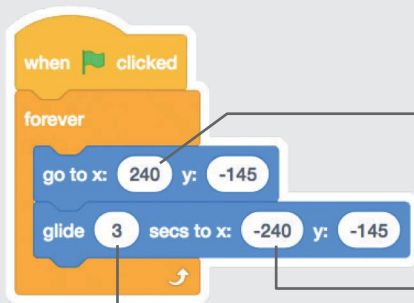
Start at the right edge of the Stage.

Glide to the left edge of the Stage.

Type a smaller number to go faster.

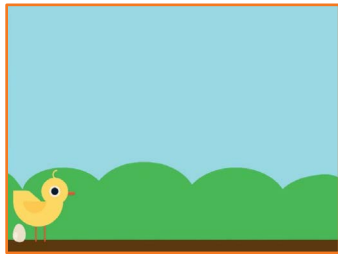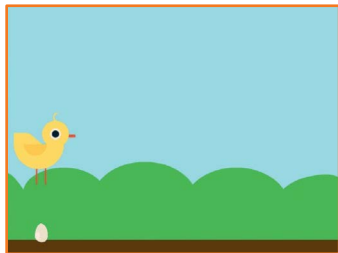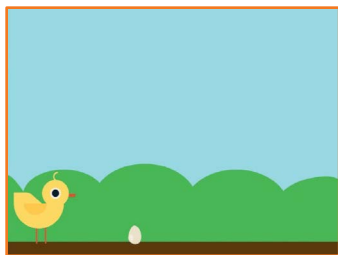## TRY IT

Click the green flag to start.

C V Б N M

Press the **space** key on your keyboard.

Add a Sound

Play a sound when your sprite jumps.

SCRATCH

Add a Sound

GET READY

Click to select the Chick sprite.

ADD THIS CODE

Chick

when space ▾ key pressed

start sound Chirp ▾

repeat 10

change y by 10

repeat 10

change y by -10
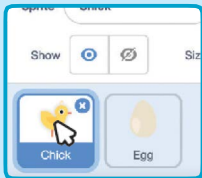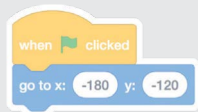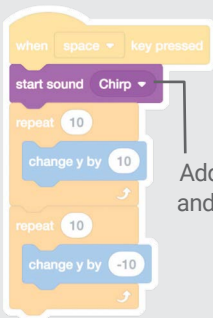
Add the **start sound** block, and then select a sound.

when ⚑ clicked

go to x: -180 y: -120

TRY IT

Click the green flag to start.

C V Б N M

Press the **space** key on your keyboard.

Stop the Game

Stop the game if your sprite touches the egg.

Stop the Game

GET READY

Click to select the **Egg** sprite.

Costumes

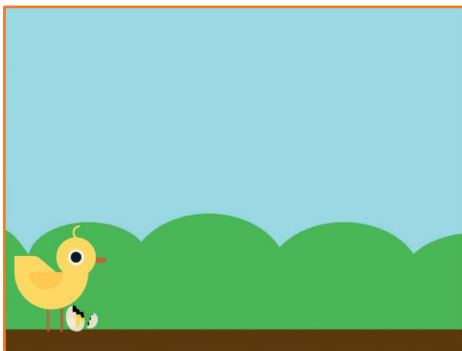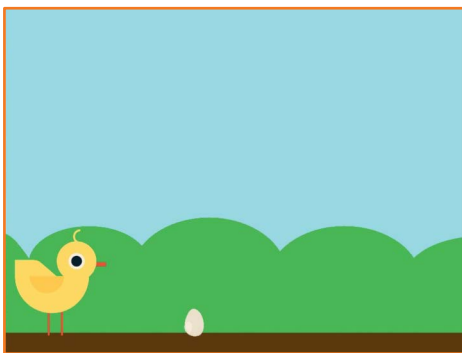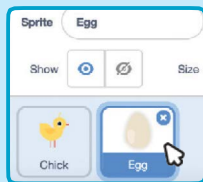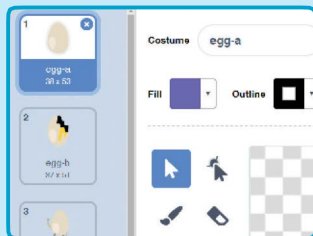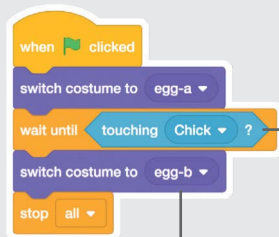Click the **Costumes** tab to see the Egg sprite's costumes.

ADD THIS CODE

Code Click the **Code** tab and add this code.

Egg

```
when [flag] clicked
switch costume to (egg-a ▼)
wait until < touching (Chick ▼) ? >
switch costume to (egg-b ▼)
stop (all ▼)
```

Insert the **touching** block and choose **Chick** from the menu.

touching (mouse-pointer ▼) ?

mouse-pointer
edge
Chick

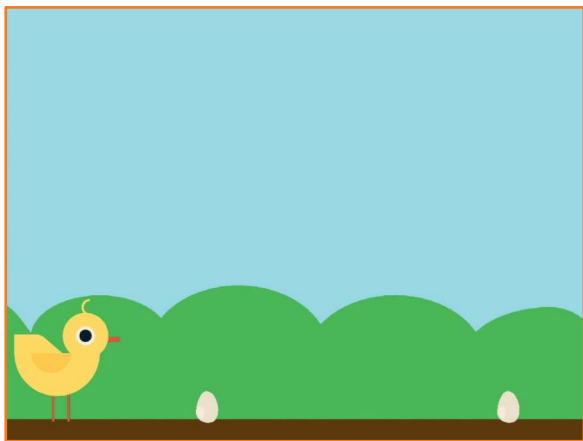Choose a second costume for the Egg sprite to change to.

TRY IT

Click the green flag to start.

Press the **space** key on your keyboard.
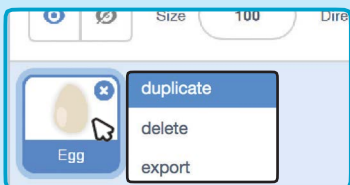
Add More Obstacles

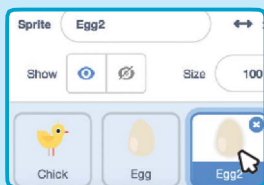Make the game harder by adding more obstacles.

scratch

Add More Obstacles
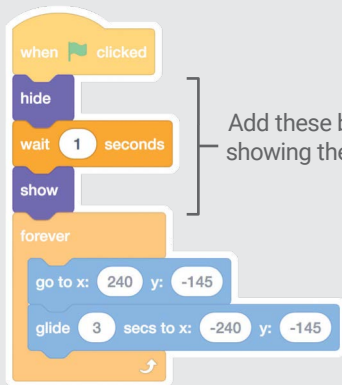
scratch.mit.edu

GET READY

To duplicate the **Egg** sprite, right-click (Mac: control-click) on the thumbnail, and then choose **duplicate**.

Click to select **Egg2**.

ADD THIS CODE

Egg2

```
when [flag] clicked
hide
wait 1 seconds
show
forever
    go to x: 240 y: -145
    glide 3 secs to x: -240 y: -145
```

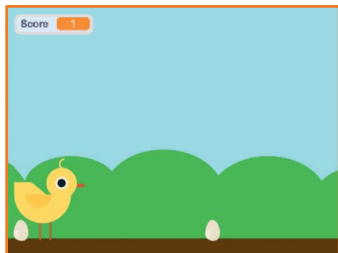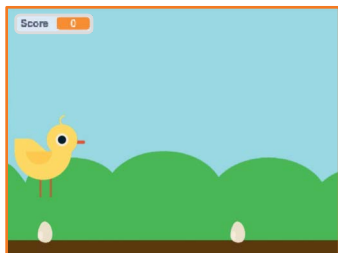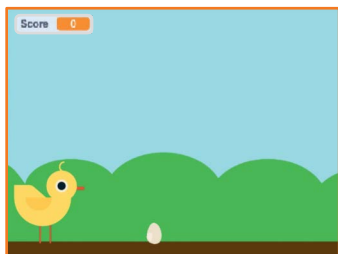Add these blocks to wait before showing the second egg.

TRY IT

Click the green flag to start.

Score

Add a point each time your sprite jumps over an egg.

scratch
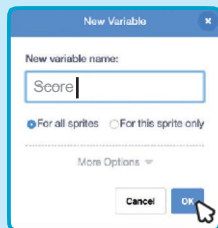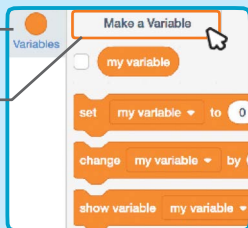
Score

GET READY

Choose **Variables**.
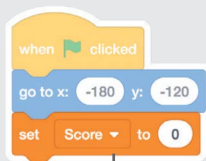
Click the **Make a Variable** button.

Make a Variable

my variable

set my variable ▾ to 0

change my variable ▾ by

show variable my variable ▾

New Variable

New variable name:

Score

○ For all sprites ○ For this sprite only

More Options ▾

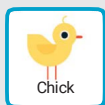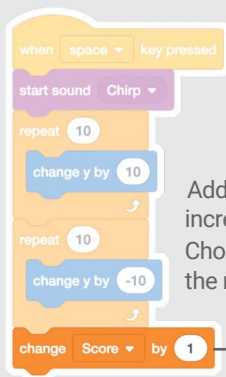Cancel OK

Name this variable **Score** and then click **OK**.

ADD THIS CODE

Click the Chick sprite and add two blocks to your code:

Chick

when ⚑ clicked

go to x: -180 y: -120

set Score ▾ to 0

Add this block and then choose **Score** from the menu.

when space ▾ key pressed

start sound Chirp ▾

repeat 10

change y by 10

repeat 10

change y by -10

change Score ▾ by 1

Add this block to increase the score. Choose **Score** from the menu.

TRY IT

Jump over the eggs to score points!