

## Make a Card



1. Fold the card in half

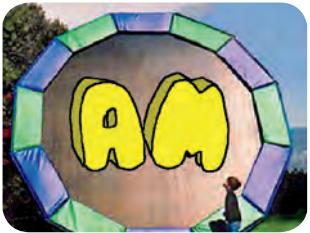


2. Glue the backs together



3. Cut along the dashed line

## Animate Your Name Cards



Animate the letters of your name, initials, or favorite word.

## Animate Your Name Cards

Try these cards in any order:

- Color Clicker
- Spin
- Play a Sound
- Dancing Letter
- Change Size
- Press a Key
- Glide Around

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Color Clicker

Make a letter change color  
when you click it.



Animate Your Name

1

SCRATCH

# Color Clicker

[scratch.mit.edu/name](http://scratch.mit.edu/name)

## GET READY



Choose a backdrop.



Choose a letter from  
the Letters category.



## ADD THIS CODE

when this sprite clicked  
change color ▾ effect by 25

Try different numbers.

## TRY IT

Click your letter.



## Make a Card



1. Fold the card in half



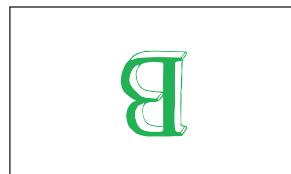
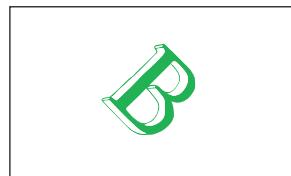
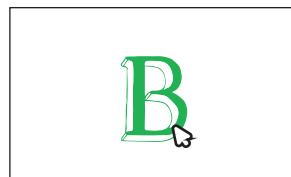
2. Glue the backs together



3. Cut along the dashed line

# Spin

Make a letter turn when you click it.



Animate Your Name

2

SCRATCH

# Spin

scratch.mit.edu/name

## GET READY

Choose a letter from  
the Letters category.

New sprite:



## ADD THIS CODE

```
when this sprite clicked
repeat (10)
  turn (18 degrees)
```

Try different  
numbers.

## TRY IT

Click your letter.



## TIP

Click this block to reset the sprite's direction.

point in direction (90°)

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Play a Sound

Click a letter to play a sound.



Animate Your Name

3

SCRATCH

# Play a Sound

scratch.mit.edu/name

## GET READY

New backdrop:



Choose a backdrop.



boardwalk

Choose a letter from the Letters category.



Click the Sounds tab.

New sound:



Choose a sound.

## ADD THIS CODE

Click the Scripts tab.

when this sprite clicked

play sound guitar strum

## TRY IT

Click your letter.

## Make a Card



1. Fold the card in half



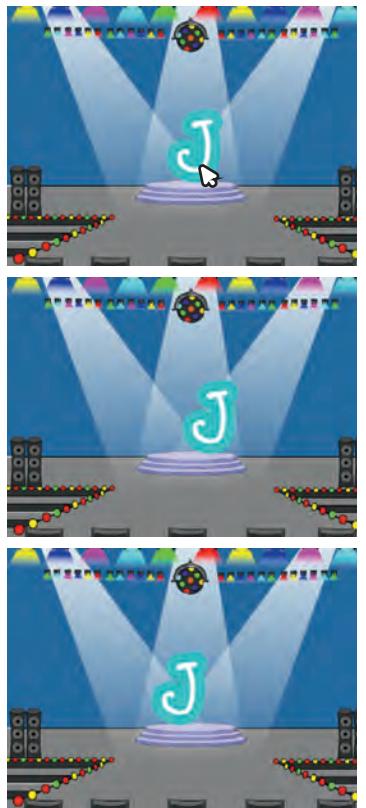
2. Glue the backs together



3. Cut along the dashed line

# Dancing Letter

Make a letter move to the beat.



Animate Your Name

4

SCRATCH

# Dancing Letter

[scratch.mit.edu/name](http://scratch.mit.edu/name)

## GET READY

New backdrop:

Choose a backdrop.



spotlight-stage

Choose a letter from  
the Letters category.

New sprite:



## ADD THIS CODE

when this sprite clicked

move 10 steps

Type a positive number  
to move forward.

play drum 1 for 0.25 beats

move -10 steps

Type a negative number  
to move back.

play drum 1 for 0.25 beats

## TIP

You can choose any drum from the menu.

play drum 1 for 0.25 beats

(1) Snare Drum

(2) Bass Drum

(3) Side Stick

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Change Size

Make a letter get bigger and then smaller.



Animate Your Name

5

SCRATCH

# Change Size

[scratch.mit.edu/name](https://scratch.mit.edu/name)

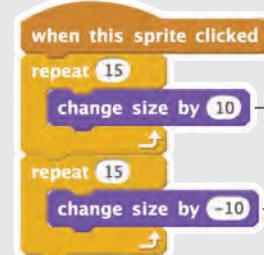
## GET READY

Choose a letter from  
the Letters category.

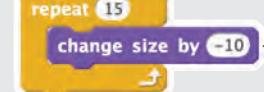
New sprite:



## ADD THIS CODE



Type a positive number  
to get bigger.



Type a negative number  
to get smaller.

## TRY IT

Click your letter.

## TIP

Click this block to reset the size.

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

## Press a Key

Press a key to make your letter change.



Animate Your Name

6

SCRATCH

## Press a Key

[scratch.mit.edu/name](http://scratch.mit.edu/name)

### GET READY

New backdrop:



Choose a backdrop.

New sprite:



Choose a letter from the Letters category.



### ADD THIS CODE

```
when space key pressed  
turn (90) degrees  
change color by (25)
```

Try different numbers.

### TRY IT

Press the **space** key.

### TIP

You can choose a different key from the menu.  
Then press that key!

```
when space key pressed  
space  
up arrow  
down arrow  
right arrow  
left arrow  
any
```

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Glide Around

Make a letter glide smoothly  
from place to place.



Animate Your Name

7

SCRATCH

## Glide Around

[scratch.mit.edu/name](https://scratch.mit.edu/name)

### GET READY

New backdrop:

Choose a backdrop.



Choose a letter from  
the Letters category.



New sprite:

### ADD THIS CODE

when this sprite clicked

glide 1 secs to x: 10 y: 100  
glide 1 secs to x: 127 y: -75  
glide 1 secs to x: 10 y: 100

Try different numbers.

### TRY IT

Click your letter to start.

### TIP

Drag your sprite to where you want it and  
then add a **glide** block to your script.



When you drag a sprite,  
its x and y position will  
update in the Blocks palette.

## Make a Card



1. Fold the card in half

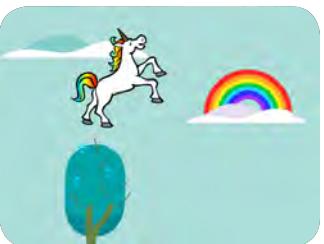
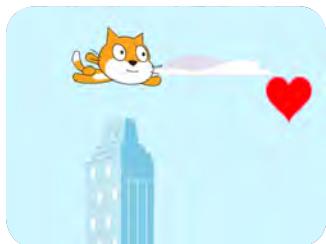


2. Glue the backs together



3. Cut along the dashed line

# Make It Fly Cards



Choose any character and make it fly!

[scratch.mit.edu/fly](https://scratch.mit.edu/fly)

# Make It Fly Cards

Use these cards in this order:

- 1 Choose a Character
- 2 Start Flying
- 3 Switch Looks
- 4 Make It Interactive
- 5 Floating Clouds
- 6 Flying Hearts
- 7 Collect Points

[scratch.mit.edu/fly](https://scratch.mit.edu/fly)

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Choose a Character

Choose a character to fly.



Time to fly!

Make It Fly

1

SCRATCH

## Choose a Character

[scratch.mit.edu/fly](http://scratch.mit.edu/fly)

### GET READY

New backdrop:



Choose a backdrop.



blue sky2

New sprite:

Choose a sprite from  
the Flying theme.



Cat1 Flying

### ADD THIS CODE



Type what you want  
your sprite to say.

### TRY IT

Click the green flag to start



## Make a Card



1. Fold the card in half



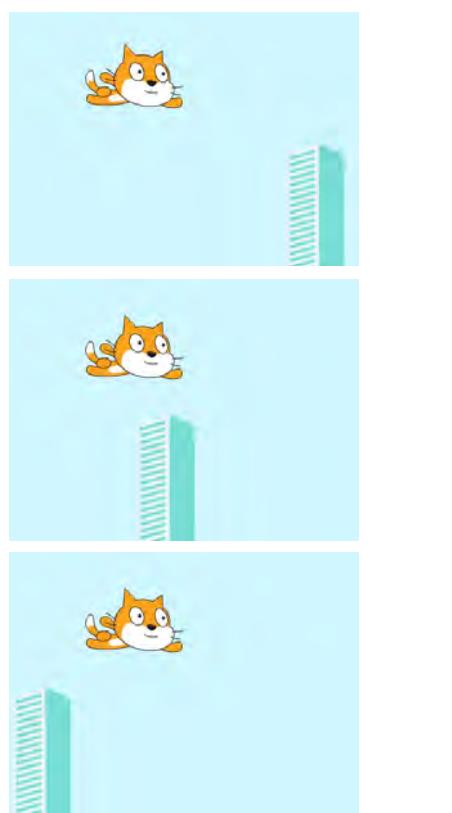
2. Glue the backs together



3. Cut along the dashed line

# Start Flying

Move the scenery so your character looks like it's flying.



Make It Fly

2

SCRATCH

# Start Flying

[scratch.mit.edu/fly](http://scratch.mit.edu/fly)

## GET READY

New sprite:

Choose a sprite to fly by,  
such as Buildings.



## ADD THIS CODE



when green flag clicked

forever

set x to 250

repeat 100

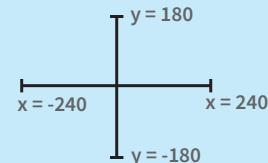
change x by -5

Start from the right  
end of the stage.

Type a negative  
number to move left.

## TIP

x is the position on the Stage from left to right.



## Make a Card



1. Fold the card in half



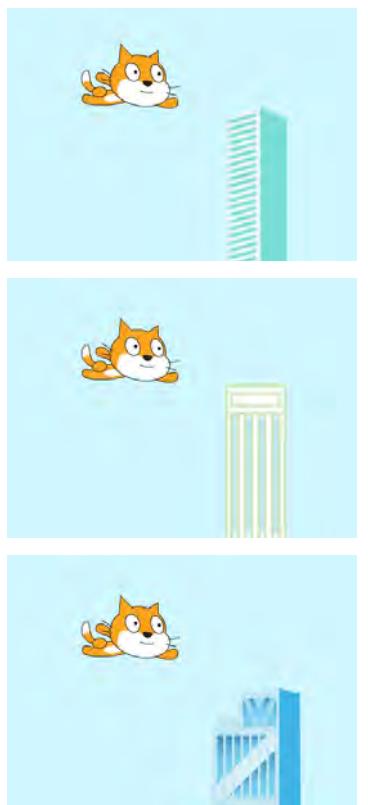
2. Glue the backs together



3. Cut along the dashed line

# Switch Looks

Add variety to your scenery.



Make It Fly

3

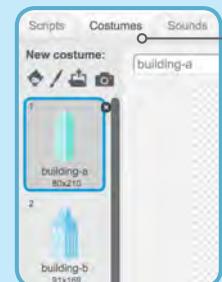
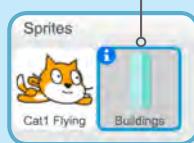
SCRATCH

## Switch Looks

[scratch.mit.edu/fly](https://scratch.mit.edu/fly)

### GET READY

Click to select the **Buildings** sprite.

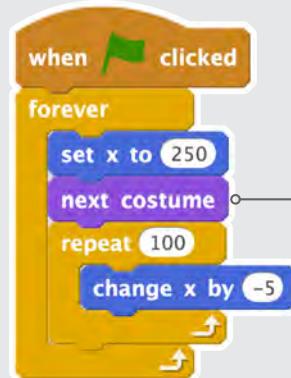


Then, click the **Costumes** tab to see different costumes.

### ADD THIS CODE



Click the **Scripts** tab.



Add this block to switch costumes.

### TRY IT

Click the green flag to start



## Make a Card



1. Fold the card in half



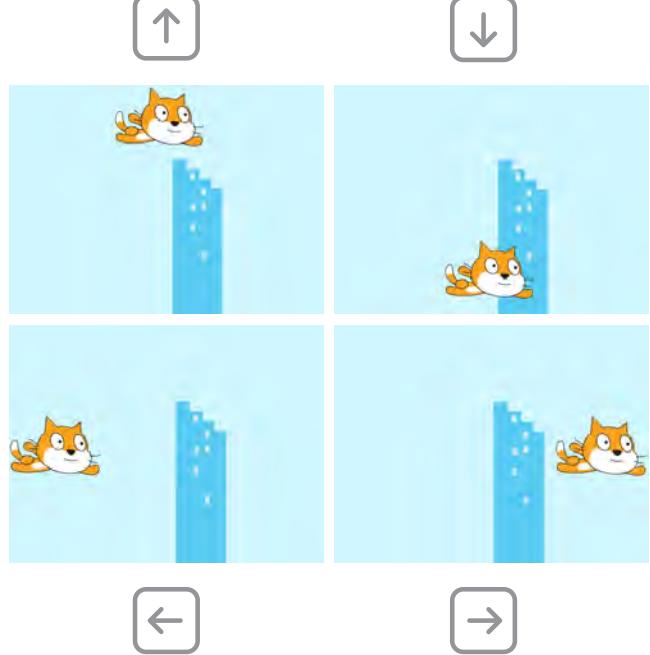
2. Glue the backs together



3. Cut along the dashed line

# Make It Interactive

Make your character move  
when you press a key.



Make It Fly

4

SCRATCH

## Make It Interactive

[scratch.mit.edu/fly](http://scratch.mit.edu/fly)

### GET READY

Click to select your flying sprite.



### ADD THIS CODE

when up arrow key pressed  
change y by 10

when down arrow key pressed  
change y by -10

when left arrow key pressed  
change x by -10

when right arrow key pressed  
change x by 10

### TRY IT

Press the arrow keys on your keyboard to make your character move.

## Make a Card



1. Fold the card in half



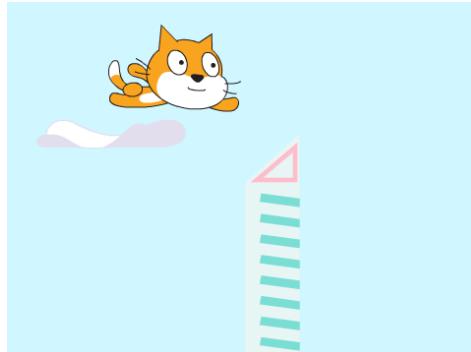
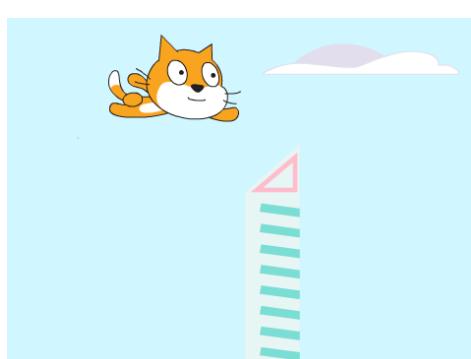
2. Glue the backs together



3. Cut along the dashed line

# Floating Clouds

Make clouds float by in the sky!



Make It Fly

5

SCRATCH

## Floating Clouds

[scratch.mit.edu/fly](https://scratch.mit.edu/fly)

### GET READY

New sprite:

Choose Clouds from the library.



Clouds

### ADD THIS CODE

Drag the pick random block into the set y to block.

Drag the pick random block into the set y to block.

Type 180 to keep Clouds in top half.

when green flag clicked

forever

set y to [pick random 1 to 180]

set x to 250

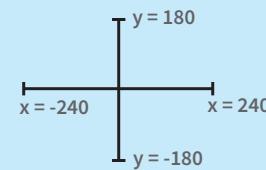
next costume

repeat (50)

change x by -10

### TIP

y is the position on the Stage from top to bottom.



## Make a Card



1. Fold the card in half



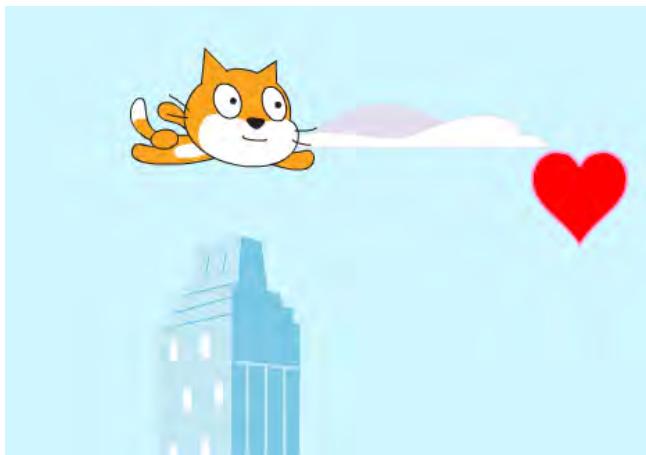
2. Glue the backs together



3. Cut along the dashed line

# Flying Hearts

Add hearts or other floating objects to collect.



Make It Fly

6

SCRATCH

## Flying Hearts

[scratch.mit.edu/fly](http://scratch.mit.edu/fly)

### GET READY

New sprite:

Choose a sprite, such as Heart.



Choose a sprite, such as Heart.

### ADD THIS CODE

go to mouse-pointer  
mouse-pointer  
random position

Choose random position from the menu.

when green flag clicked  
forever  
[go to random position, set x to 250, repeat (32) [change x by (-15)]]

### TRY IT

Click the green flag to start



## Make a Card



1. Fold the card in half



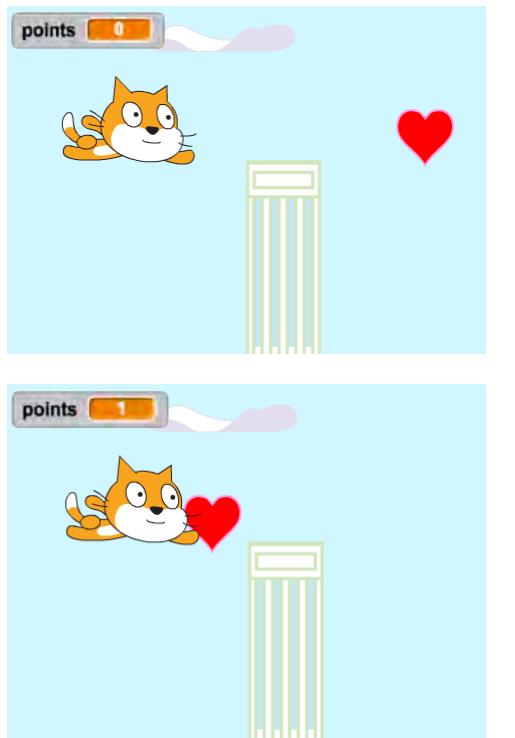
2. Glue the backs together



3. Cut along the dashed line

# Collect Points

Add a point each time you touch a heart or other object.



Make It Fly

7

SCRATCH

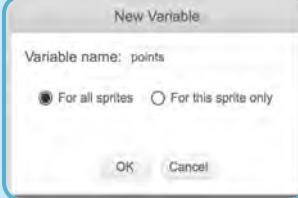
## Collect Points

[scratch.mit.edu/fly](http://scratch.mit.edu/fly)

### GET READY

Choose Data

Click the Make a Variable button.

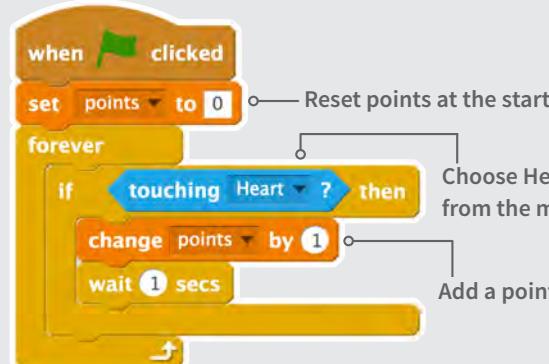


Name this variable **points** and then click OK.

### ADD THIS CODE



Select your flying sprite.



Reset points at the start.  
Choose Heart from the menu.  
Add a point.

### TRY IT

Click the green flag to start



## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

## Make Music Cards



Choose instruments, add sounds, and press keys to play music.

[scratch.mit.edu/music](https://scratch.mit.edu/music)

SCRATCH

[scratch.mit.edu/music](https://scratch.mit.edu/music)

SCRATCH

## Make Music Cards

Try these cards in any order:

- Play a Drum
- Make a Rhythm
- Animate a Drum
- Make a Melody
- Play a Chord
- Surprise Song
- Beatbox Sounds
- Record Sounds
- Play a Song

[scratch.mit.edu/music](https://scratch.mit.edu/music)

SCRATCH

[scratch.mit.edu/music](https://scratch.mit.edu/music)

SCRATCH

## Make a Card



1. Fold the card in half



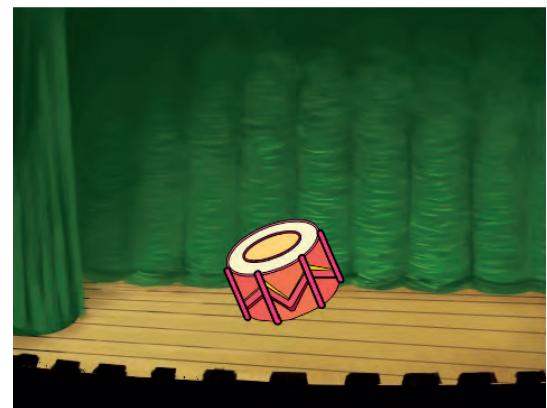
2. Glue the backs together



3. Cut along the dashed line

# Play a Drum

Press a key to make a drum sound.



Make Music

1

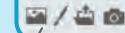
SCRATCH

# Play a Drum

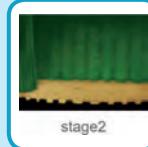
[scratch.mit.edu/music](https://scratch.mit.edu/music)

## GET READY

New backdrop:

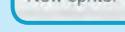


Choose a backdrop.



Choose a drum from the Music theme.

New sprite:



## ADD THIS CODE

when space key pressed

play sound low tom



Select the sound you want from the menu.

## TRY IT

Press the **space** key to start.

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Make a Rhythm

Play a sequence of drum sounds.



Make Music

2

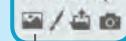
SCRATCH

# Make a Rhythm

[scratch.mit.edu/music](http://scratch.mit.edu/music)

## GET READY

New backdrop:



Choose a backdrop.

New sprite:



Choose a drum from the Music theme.

Drum-Tabla



## ADD THIS CODE

```
when space key pressed
repeat (3)
  play sound [hi na tabla v]
  wait (0.25) secs
  play sound [hi tun tabla v]
  wait (0.25) secs
```

Type how many times you want to repeat.

Try different numbers to change the rhythm.

## TRY IT

Press the **space** key to start.

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Animate a Drum

Switch between costumes to animate.



Make Music

3

SCRATCH

# Animate a Drum

[scratch.mit.edu/music](https://scratch.mit.edu/music)

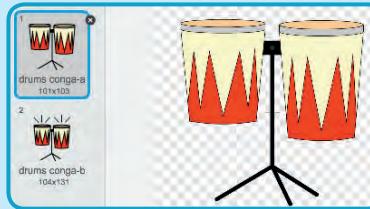
## GET READY

Choose a drum from the Music theme.

New sprite: ♦ / 🎤 / 🎶 / 📸



Click the Costumes tab to see the costumes.



You can use the paint tools to change colors.

## ADD THIS CODE

Click the Scripts tab.

```
when left arrow key pressed
repeat (4)
  play sound [high conga v]
  next costume
  wait (0.25) secs
  play sound [low conga v]
  next costume
  wait (0.25) secs
```

## TRY IT

Press the left arrow key to start.

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Make a Melody

Play a series of notes.



Make Music

4

SCRATCH

# Make a Melody

[scratch.mit.edu/music](http://scratch.mit.edu/music)

## GET READY

New backdrop:



Choose a backdrop.



stage2

Choose an instrument from the Music theme.



Saxophone

## ADD THIS CODE

```
when up arrow key pressed
  play sound [C2 sax v]
  wait [0.25 secs]
  play sound [G sax v]
  wait [0.25 secs]
  play sound [E sax v]
```

Choose up arrow (or another key).

Choose different sounds.

## TRY IT

Press the up arrow key to start.

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Play a Chord

Play more than one sound at a time to make a chord.



Make Music

5

SCRATCH

# Play a Chord

[scratch.mit.edu/music](https://scratch.mit.edu/music)

## GET READY

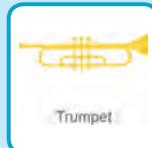
New backdrop:

Choose a backdrop.



Choose an instrument from the Music theme.

New sprite:



## ADD THIS CODE

when **down arrow** key pressed  
play sound **F trumpet**  
play sound **A trumpet**  
play sound **C2 trumpet**

Choose **down arrow** (or another key).

Choose different sounds.

## TIP

Use the **play sound** block to make sounds play at the same time.

Use **play sound until done** to play sounds one after another.

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Surprise Song

Play a random sound from a list of sounds.



Make Music

6

SCRATCH

# Surprise Song

[scratch.mit.edu/music](http://scratch.mit.edu/music)

## GET READY

Choose an instrument from the Music theme.

New sprite:



Click the **Sounds** tab to see all the sounds of your instrument.



## ADD THIS CODE

Click the **Scripts** tab.

Choose right arrow.  
Insert a pick random block.  
Type the number of sounds in your instrument.

## TRY IT

Press the **right arrow** key to start.

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Beatbox Sounds

Play a series of vocal sounds.



Make Music

7

SCRATCH

## Beatbox Sounds

[scratch.mit.edu/music](http://scratch.mit.edu/music)

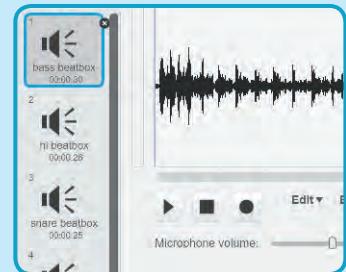
### GET READY

Choose the Microphone.

New sprite: / /



Click the **Sounds** tab to see all the beatbox sounds.



### ADD THIS CODE

Click the **Scripts** tab.

```
when [b] key pressed
repeat (4)
  play sound [bass beatbox v]
  wait (0.25) secs
  play sound [pick random 1 to 10 v]
  wait (0.25) secs
end
```

Choose **b** (or another key).

Insert a **pick random 1 to 10** block.

### TRY IT

Press the **B** key to start.

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Record Sounds

Make your own sounds to play.



Make Music

8

SCRATCH

## Record Sounds

[scratch.mit.edu/music](http://scratch.mit.edu/music)

### GET READY



Choose a backdrop.



beach malibu

Choose any sprite you want.



New sprite:



Beachball

Click the **Sounds** tab.



Click this icon. (You'll need a microphone.)



Click to record a short sound, like "boing" or "bop."

### ADD THIS CODE

Click the **Scripts** tab.

when **c** key pressed  
play sound **recording1**

Choose **c** (or another key).

### TRY IT

Press the **C** key to start.

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Play a Song

Add a music loop as background music.



Make Music

9

SCRATCH

## Play a Song

[scratch.mit.edu/music](https://scratch.mit.edu/music)

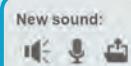
### GET READY

Choose a sprite,  
like Speaker.

New sprite:



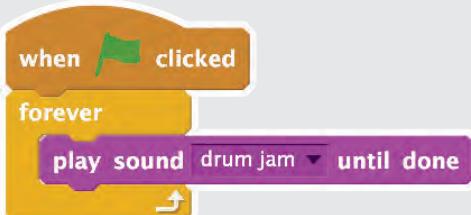
Click the **Sounds** tab.



Select a sound from the  
**Music Loops** category.

### ADD THIS CODE

Click the **Scripts** tab.



### TIP

Make sure to use **play sound [drum jam v] until done** (not **play sound [drum jam v]**)  
or else the music will interrupt itself.

## Make a Card



1. Fold the card in half

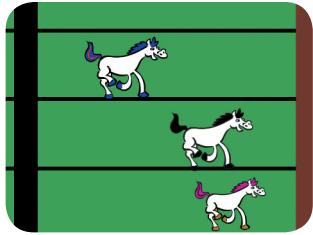
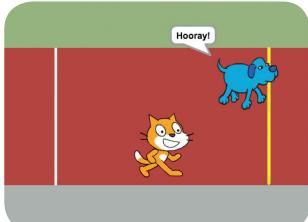


2. Glue the backs together



3. Cut along the dashed line

## Race to the Finish Cards



Make a game where two characters race each other.

[scratch.mit.edu/racegame](https://scratch.mit.edu/racegame)

SCRATCH

## Race to the Finish Cards

Use these cards in this order:

- 1 Start the Race**
- 2 On Your Mark**
- 3 Reach the Finish Line**
- 4 Choose a Racer**
- 5 Add a Sound**
- 6 Animate the Run**
- 7 Race the Computer**

[scratch.mit.edu/racegame](https://scratch.mit.edu/racegame)

SCRATCH

## Make a Card



1. Fold the card in half



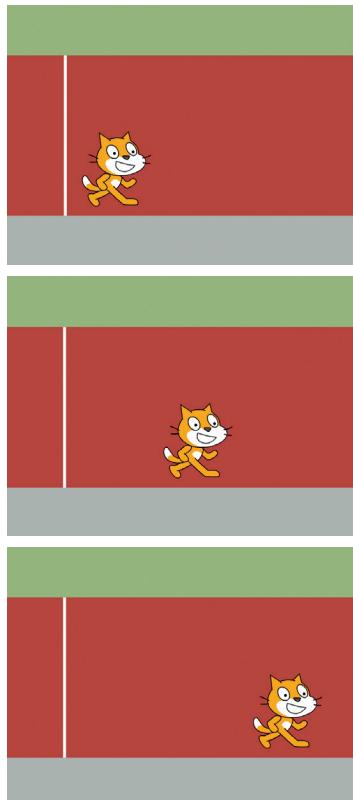
2. Glue the backs together



3. Cut along the dashed line

# Start the Race

Make your sprite move on a racetrack.



Race to the Finish

1

SCRATCH

# Start the Race

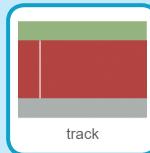
[scratch.mit.edu/racegame](http://scratch.mit.edu/racegame)

## GET READY

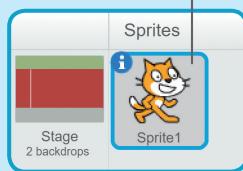
New backdrop:



Choose a backdrop.



Click to select the cat.



## ADD THIS CODE

Click the **Scripts** tab.

when space key pressed

move (5) steps

Try different numbers to change the speed.

## TRY IT

Press the **space** key to move the sprite.

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# On Your Mark

Choose a starting point for your sprite.



Race to the Finish

2

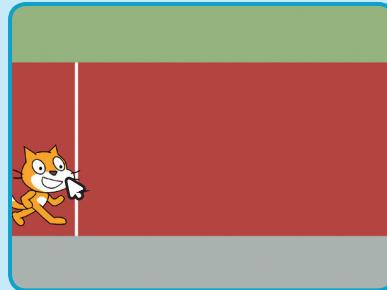
SCRATCH

# On Your Mark

[scratch.mit.edu/racegame](http://scratch.mit.edu/racegame)

## GET READY

Drag your sprite to where you want it on the Stage.



## ADD THIS CODE



when clicked  
go to x: -200 y: -45

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

## TRY IT

Press the **space** key  
to move your sprite.

Click the green  
flag to reset.



## Make a Card



1. Fold the card in half



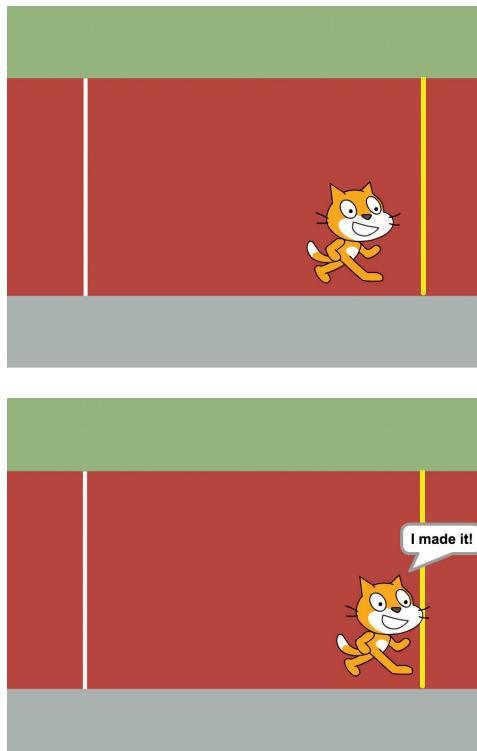
2. Glue the backs together



3. Cut along the dashed line

# Reach the Finish Line

Make your sprite do something when it reaches the finish line.



Race to the Finish

3

SCRATCH

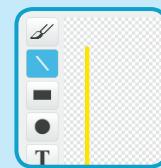
# Reach the Finish Line

[scratch.mit.edu/racegame](http://scratch.mit.edu/racegame)

## GET READY

Click the paintbrush to draw a new sprite.

New sprite:



Choose the **Line** tool and draw a line.

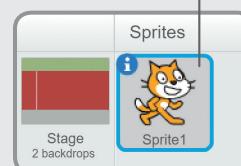
To make a straight line, hold down the Shift key while drawing.

Drag the line (Sprite2) to where you want it on the Stage.



## ADD THESE BLOCKS

Click to select the cat.



Click the **Scripts** tab.



Choose **Sprite2**.

Add these blocks.

Click the green flag to start.



Keep pressing the **space** key until you cross the finish line!

## Make a Card



1. Fold the card in half



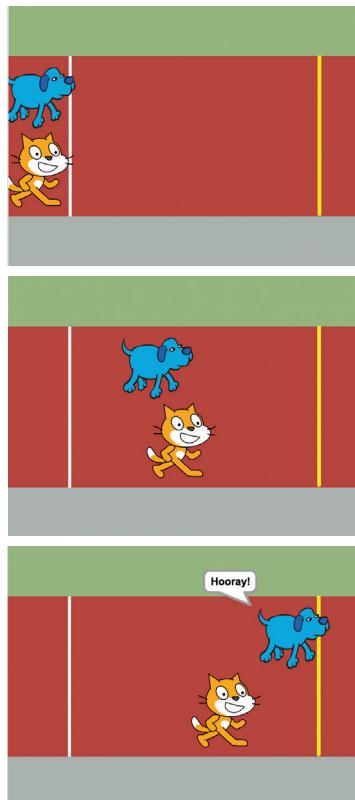
2. Glue the backs together



3. Cut along the dashed line

# Choose a Racer

Add another sprite so you can have a race.



Race to the Finish

4

SCRATCH

# Choose a Racer

[scratch.mit.edu/racegame](http://scratch.mit.edu/racegame)

## GET READY

Choose a sprite to be the second racer.

New sprite: 🐕 / 🐱 / 📸



Dog2

## ADD THIS CODE

Drag your sprite to where you want it to start.

when clicked  
go to x: -200 y: 60

Choose right arrow or a different key.

when right arrow key pressed  
move 5 steps  
if touching Sprite2 ? then  
say Hooray! for 2 secs

## TRY IT

Click the green flag to start.



Press the **space** key and the **right arrow** key to make your sprites race.

## Make a Card



1. Fold the card in half



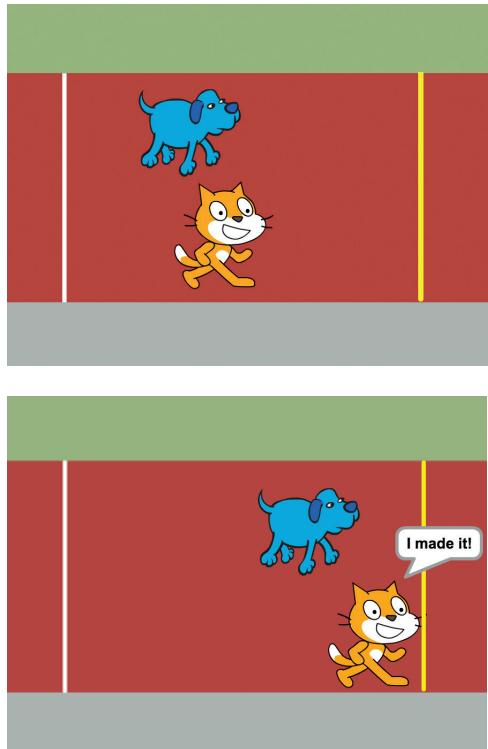
2. Glue the backs together



3. Cut along the dashed line

# Add a Sound

Play a sound when you win the race.



Race to the Finish

5

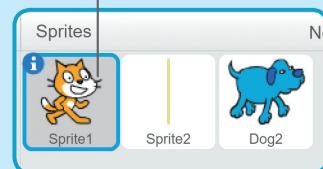
SCRATCH

# Add a Sound

[scratch.mit.edu/racegame](http://scratch.mit.edu/racegame)

## GET READY

Click to select the cat.



Click the Sounds tab.



Then choose a sound from the Sound library, like cheer.

## ADD THIS BLOCK

Click the Scripts tab.



Add this block to play the sound.

## TRY IT

Click the green flag to start.



Press the space key until you cross the finish line!



## Make a Card



1. Fold the card in half



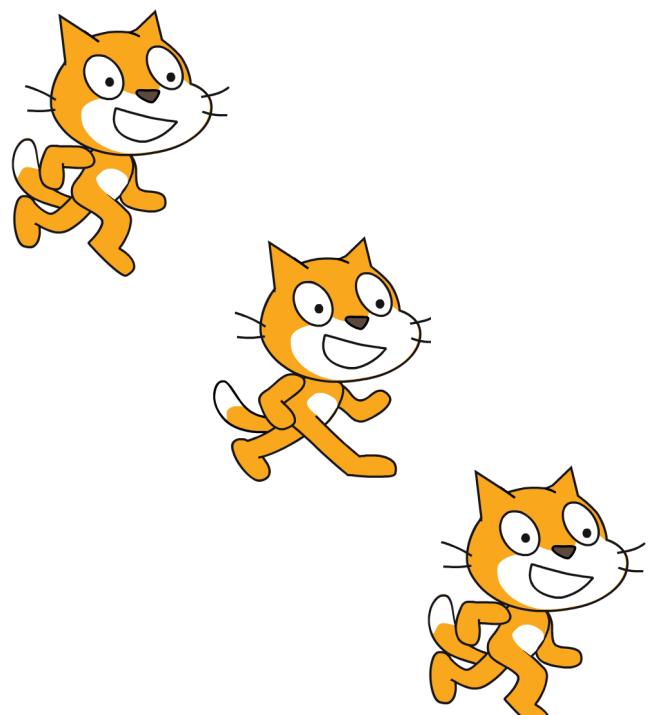
2. Glue the backs together



3. Cut along the dashed line

# Animate the Run

Switch costumes to make your sprite look like it's running.



Race to the Finish

6

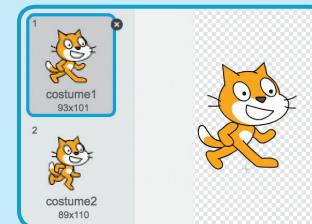
SCRATCH

# Animate the Run

[scratch.mit.edu/racegame](http://scratch.mit.edu/racegame)

## GET READY

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



## ADD THIS BLOCK

Click the **Scripts** tab.



```
when space key pressed
  move (5) steps
  next costume
  if touching [Sprite2 v] then
    say [I made it!] for (2) secs
    play sound [cheer v]
```

Add this block to switch between costumes.

## TRY IT

Press the **space** key.

## TIP

You can animate any sprite that has more than one costume.

## Make a Card



1. Fold the card in half



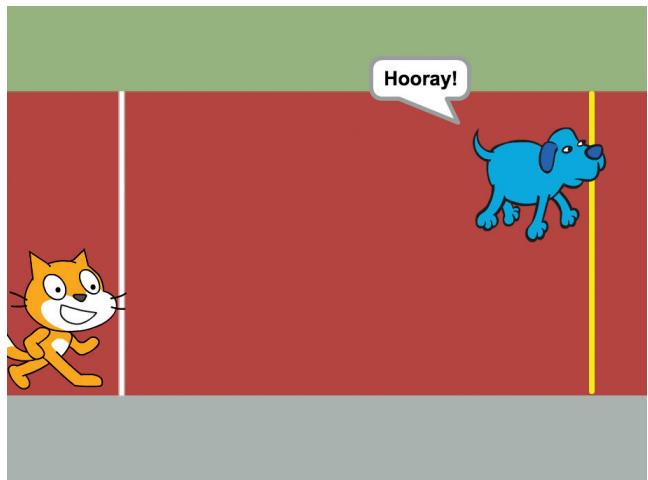
2. Glue the backs together



3. Cut along the dashed line

# Race the Computer

Race against a sprite that moves automatically.



Race to the Finish

7

SCRATCH

# Race the Computer

[scratch.mit.edu/racegame](http://scratch.mit.edu/racegame)

## GET READY

Choose the sprite you want to move automatically.



## ADD THIS CODE

Type a smaller number of seconds to go faster.

```
when green flag clicked
go to x: -200 y: 60
glide 7 secs to x: 140 y: 60
say Hooray! for 2 secs
```

Click the green flag to start.



Press the space key to move the other sprite.

## TRY IT

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

## Hide and Seek Cards



Make a hide-and-seek game with characters that appear and disappear.

## Hide and Seek Cards

Use these cards in this order:

- 1 Disappear**
- 2 Click and Say**
- 3 Surprise Timing**
- 4 Go Random!**
- 5 Click for Points**
- 6 Hiding Place**

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Disappear

Make a sprite disappear and appear again.



Hide and Seek

1

SCRATCH

# Disappear

[scratch.mit.edu/hide](http://scratch.mit.edu/hide)

## GET READY

New backdrop:



Choose a backdrop.



Choose a sprite to hide.

New sprite:



Gobo

## ADD THIS CODE



```
when green flag clicked
  forever
    hide
    wait [1 sec]
    show
    wait [1 sec]
```

## TRY IT

Click the green flag to start.



## Make a Card



1. Fold the card in half



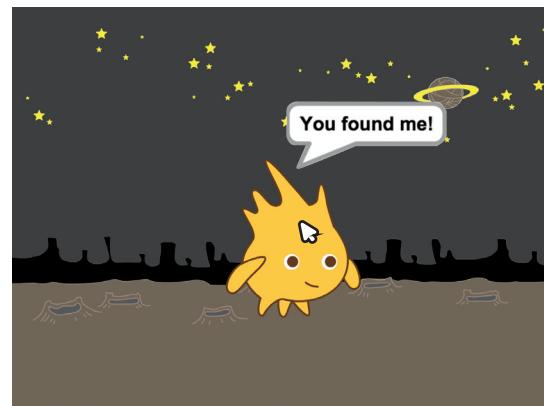
2. Glue the backs together



3. Cut along the dashed line

# Click and Say

Make a sprite speak when you click it.



Hide and Seek

2

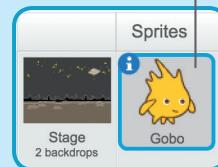
SCRATCH

## Click and Say

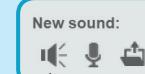
[scratch.mit.edu/hide](http://scratch.mit.edu/hide)

### GET READY

Click to select your sprite.



Click the **Sounds** tab.



Then choose a sound from the Sound library.

### ADD THIS CODE

Click the **Scripts** tab.

```
when this sprite clicked
play sound [hey v]
say [You found me!] for [1] secs
```

Type what you want your sprite to say.

### TRY IT

Click your sprite.



## Make a Card



1. Fold the card in half



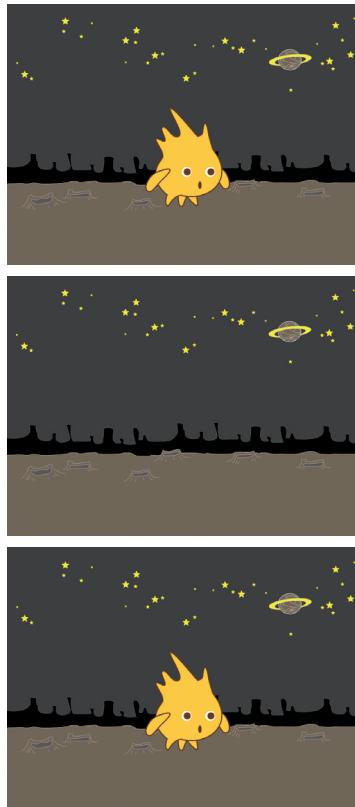
2. Glue the backs together



3. Cut along the dashed line

# Surprise Timing

Make a sprite wait for a random amount of time before appearing again.



Hide and Seek

3

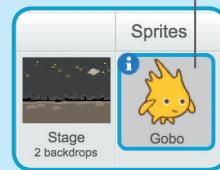
SCRATCH

## Surprise Timing

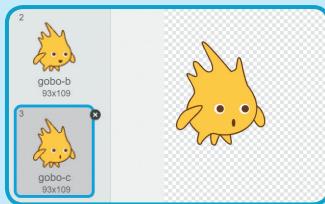
[scratch.mit.edu/hide](http://scratch.mit.edu/hide)

### GET READY

Click to select your sprite.

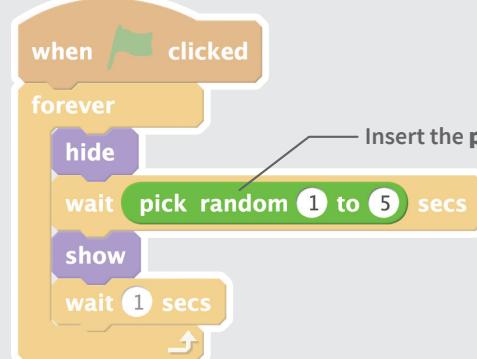


Click the Costumes tab and choose the costume you want.



### ADD THIS BLOCK

Click the Scripts tab.



### TIP

Play with the timing! Try typing in a different range of numbers.

wait [pick random 0.5 to 1.5 secs]

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

## Go Random!

Make a sprite jump to random spots on the Stage.



Hide and Seek

4

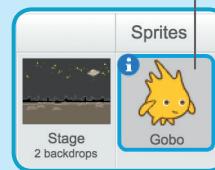
SCRATCH

## Go Random!

[scratch.mit.edu/hide](http://scratch.mit.edu/hide)

### GET READY

Click to select your sprite.



### ADD THIS BLOCK

```
when green flag clicked
  forever
    go to [random position v]
    hide
    wait [pick random 1 to 5 secs]
    show
    wait [1 sec]
```

Choose **random position** from the menu.

```
when green flag clicked
  forever
    go to [random position v]
    hide
    wait [pick random 1 to 5 secs]
    show
    wait [1 sec]
```

Add this block.

### TRY IT

Click the green flag to start.



## Make a Card



1. Fold the card in half



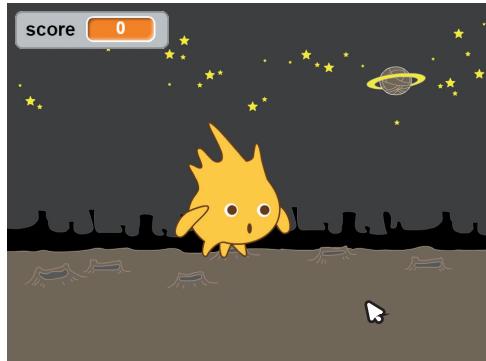
2. Glue the backs together



3. Cut along the dashed line

# Click for Points

Add a point each time you click a sprite.



## Click for Points

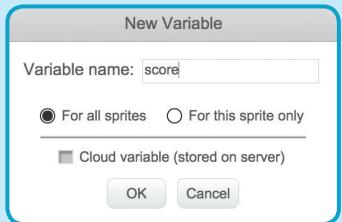
[scratch.mit.edu/hide](http://scratch.mit.edu/hide)

### GET READY

Choose Data.



Click the **Make a Variable** button.



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

### ADD THIS BLOCK



when this sprite clicked  
play sound [hey v]  
say [You found me!] for [1] secs  
change [score v] by [1]

Add this block to increase the score.

### TIP

Add this script to make the score reset to 0 when you click the green flag.

when [green flag] clicked  
set [score v] to [0]

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Hiding Place

Make a sprite hide behind something.



Hide and Seek

6

SCRATCH

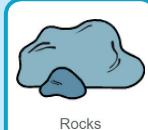
# Hiding Place

[scratch.mit.edu/hide](http://scratch.mit.edu/hide)

## GET READY

Choose a sprite to be a hiding place, like Rocks.

New sprite:



Then choose another sprite who will hide.



## ADD THIS CODE



when green flag clicked  
go to [Rocks v]  
move [pick random -100 to 100] steps  
hide  
wait [pick random 1 to 5] secs  
show  
wait [1] secs



when green flag clicked  
forever  
[go to [Rocks v]  
move [pick random -100 to 100] steps  
hide  
wait [pick random 1 to 5] secs  
show  
wait [1] secs]

Click the **Grow** or **Shrink** tool and then click the sprite to change its size.

Grow Shrink

## Make a Card



1. Fold the card in half

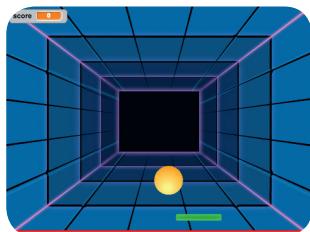


2. Glue the backs together



3. Cut along the dashed line

## Pong Game Cards



Make a bouncing ball game with sounds, points, and other effects.

[scratch.mit.edu/pong](https://scratch.mit.edu/pong)

SCRATCH

[scratch.mit.edu/pong](https://scratch.mit.edu/pong)

SCRATCH

## Make a Card



1. Fold the card in half



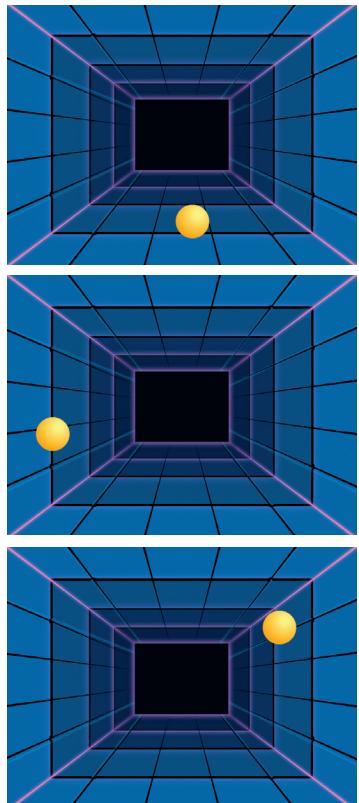
2. Glue the backs together



3. Cut along the dashed line

# Bounce Around

Make a ball move around the Stage.



Pong Game

1

SCRATCH

# Bounce Around

[scratch.mit.edu/pong](http://scratch.mit.edu/pong)

## GET READY

New backdrop:



Choose a backdrop.



neon tunnel

Choose a ball.



Ball

## ADD THIS CODE

```
when green flag clicked
  turn (15) degrees
  forever
    move (15) steps
    if on edge, bounce
```

Type a bigger number  
to move faster.

## TRY IT

Click the green flag to start.



## Make a Card



1. Fold the card in half



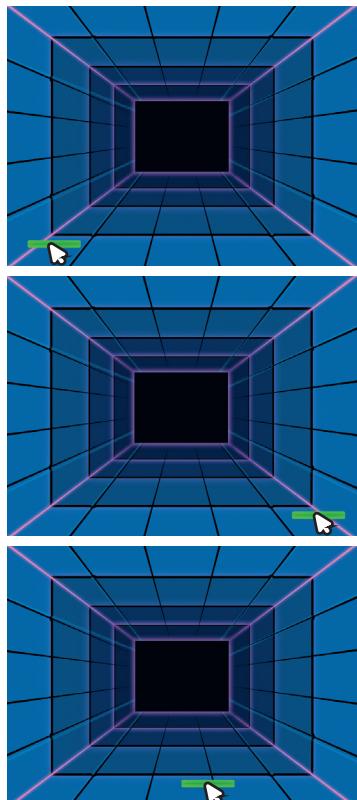
2. Glue the backs together



3. Cut along the dashed line

# Move the Paddle

Control a paddle by moving  
your mouse pointer.



Pong Game

2

SCRATCH

# Move the Paddle

[scratch.mit.edu/pong](http://scratch.mit.edu/pong)

## GET READY

Choose a sprite for hitting  
the ball, such as Paddle

New sprite:

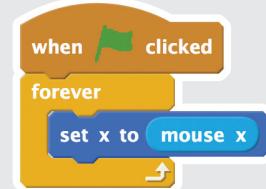


Paddle

Then, drag your paddle to the bottom of the Stage.

## ADD THIS CODE

Insert the **mouse x** block  
in the **set x to** block.



## TRY IT

Click the green  
flag to start.



Move your mouse pointer  
to move the paddle.

## TIP

You can see the x position change as you  
move the mouse across the Stage.



## Make a Card



1. Fold the card in half



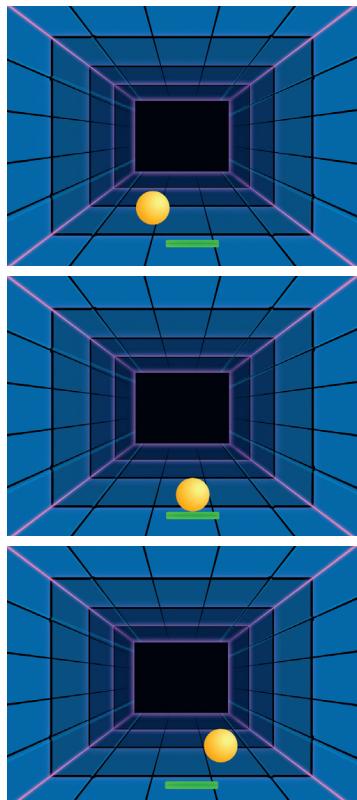
2. Glue the backs together



3. Cut along the dashed line

# Bounce Off the Paddle

Make the ball bounce off the paddle.



Pong Game

3

SCRATCH

# Bounce Off the Paddle

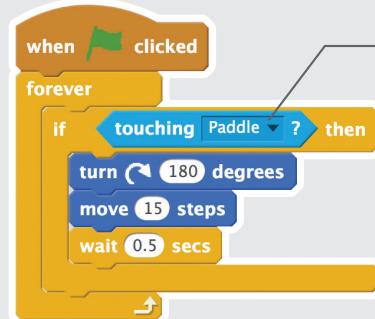
[scratch.mit.edu/pong](http://scratch.mit.edu/pong)

## GET READY



Click to select  
the Ball sprite.

## ADD THIS CODE



Choose the Paddle  
sprite from the menu.

## TRY IT

Click the green flag to start.



## TIP

Want the ball to turn randomly? Insert a pick random block into the turn block:

turn 170 pick random 170 to 190

Type in numbers around 180.

## Make a Card



## 1. Fold the card in half



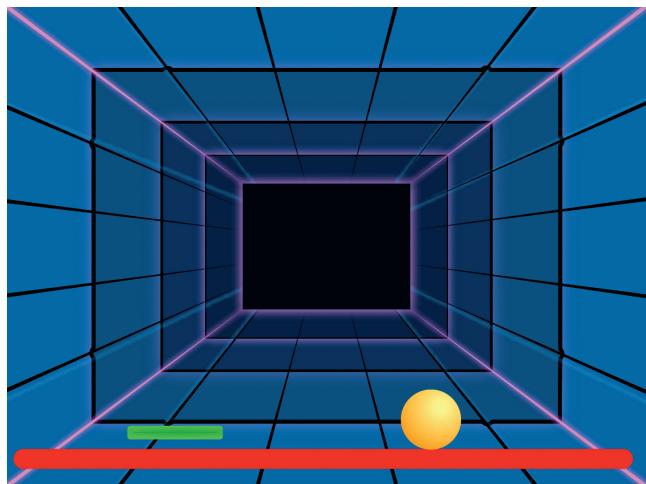
## 2. Glue the backs together



### 3. Cut along the dashed line

# Game Over

**Stop the game if the ball hits the red line.**



## Pong Game

4

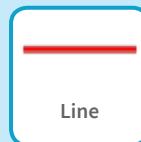
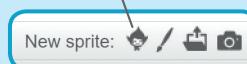
Scratch

# Game Over

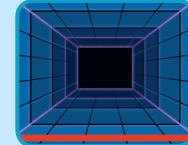
[scratch.mit.edu/pong](http://scratch.mit.edu/pong)

GET READY

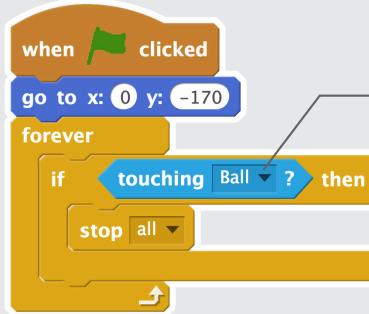
Choose a sprite called Line.



Drag the Line to the bottom of the Stage.



## **ADD THIS CODE**



— Choose the **Ball** sprite from the menu.

## TRY IT

Click the green flag to start.



## Make a Card



1. Fold the card in half



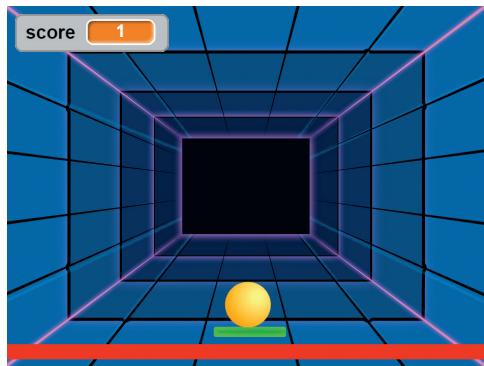
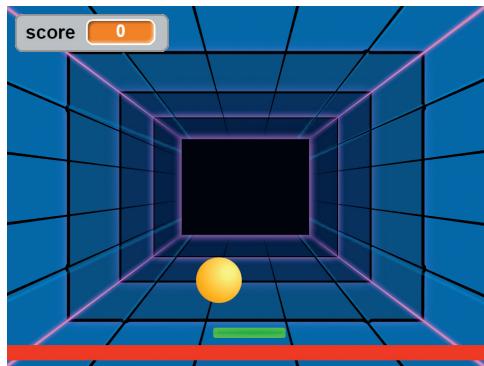
2. Glue the backs together



3. Cut along the dashed line

# Score Points

Add a point each time you hit  
the ball with the paddle.



Pong Game

5

SCRATCH

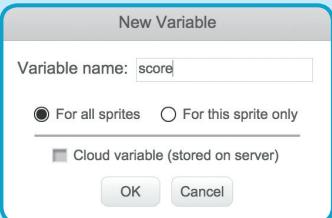
# Score Points

[scratch.mit.edu/pong](http://scratch.mit.edu/pong)

## GET READY

Choose Data.

Make a Variable  
Make a List

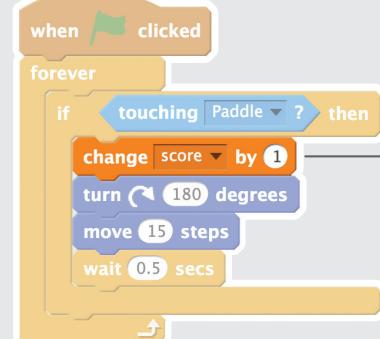


Click the Make a Variable button.

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

## ADD THIS BLOCK

Click to select  
the Ball sprite.



Add this block to  
increase the score.

## TIP

Use a **set score to 0** block to reset the score when you click the green flag.



## Make a Card



1. Fold the card in half



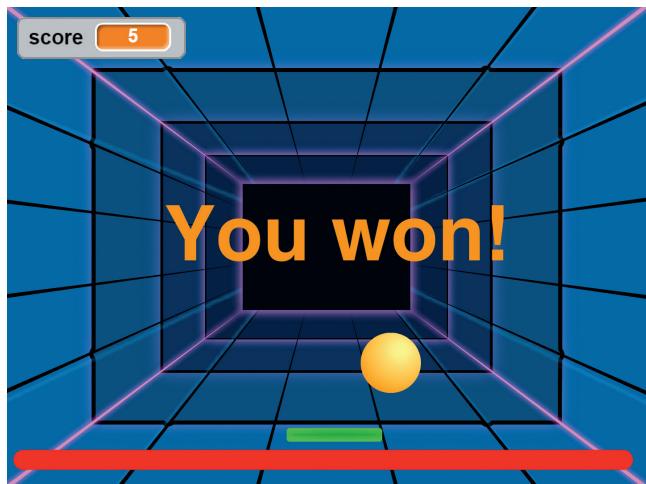
2. Glue the backs together



3. Cut along the dashed line

# Win the Game

When you score enough points,  
display a winning message!



Pong Game

6

SCRATCH

# Win the Game

[scratch.mit.edu/pong](http://scratch.mit.edu/pong)

## GET READY

Click the paintbrush  
to draw a new sprite.

New sprite:

Bitmap Mode  
 Convert to vector

Click the **Convert  
to vector** button.

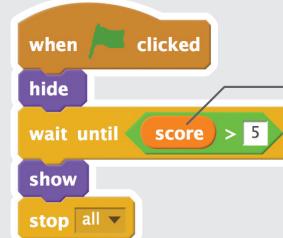
Use the **Text** tool to write  
a message, like "You won!"

You won!

You can change the font  
color, size, and style.

## ADD THIS CODE

Click the **Scripts** tab.



Insert the **score** block.

Click the green  
flag to start.



Play until you score  
enough points to win!

## Make a Card



1. Fold the card in half

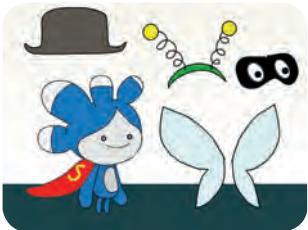


2. Glue the backs together



3. Cut along the dashed line

## Fashion Game Cards



Dress up a character with different clothes and styles.

[scratch.mit.edu/fashion](http://scratch.mit.edu/fashion)

SCRATCH

[scratch.mit.edu/fashion](http://scratch.mit.edu/fashion)

SCRATCH

## Fashion Game Cards

Start with the first card and then try the other cards in any order:

- Choose Your Character
- Play with Colors
- Change Styles
- Change Backdrops
- Lay Out Your Clothes
- Glide into Place
- Snap into Place

[scratch.mit.edu/fashion](http://scratch.mit.edu/fashion)

SCRATCH

SCRATCH

## Make a Card



1. Fold the card in half



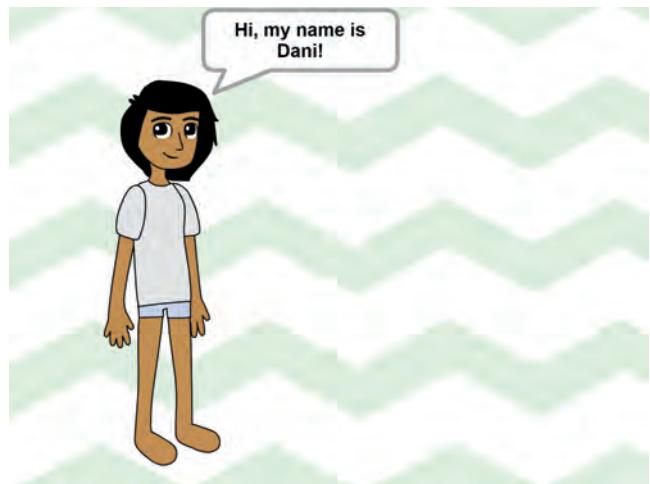
2. Glue the backs together



3. Cut along the dashed line

# Choose Your Character

Choose your character and have them say something.



Fashion Game

1

SCRATCH

# Choose Your Character

[scratch.mit.edu/fashion](http://scratch.mit.edu/fashion)

## GET READY

New backdrop:



Choose a backdrop.

Choose a character from the Dress-Up theme.

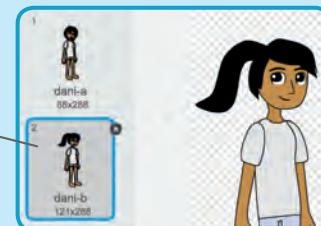
New sprite:



Dani

Click the Costumes tab.

Then select the look you want.



You can use the paint bucket to change colors!

## ADD THIS CODE

Click the Scripts tab.

when green flag clicked  
go to x: -120 y: 10  
say [Hi, my name is Dani!] for [2] secs

Set the starting position.  
Type what you want your character to say.

## TRY IT

Click the green flag to start.



## Make a Card



1. Fold the card in half



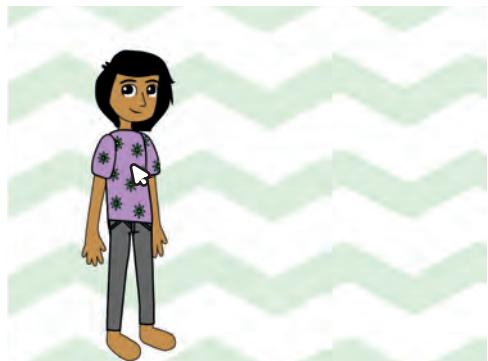
2. Glue the backs together



3. Cut along the dashed line

# Play with Colors

Click to change the color of clothing.



Fashion Game

2

SCRATCH

# Play with Colors

[scratch.mit.edu/fashion](http://scratch.mit.edu/fashion)



## GET READY

Choose a piece of clothing, like Shirt2.

New sprite:



Drag the clothing onto your character.



## ADD THIS CODE



when this sprite clicked  
change color ▾ effect by 25

## TRY IT

Click your clothing to make it change color.



## Make a Card



1. Fold the card in half



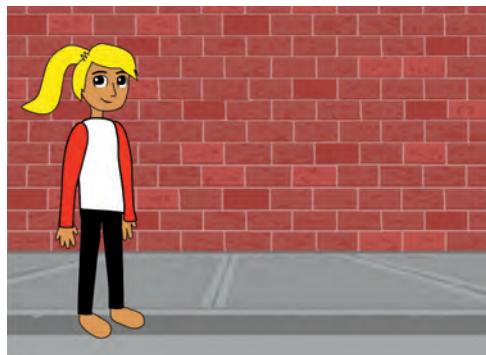
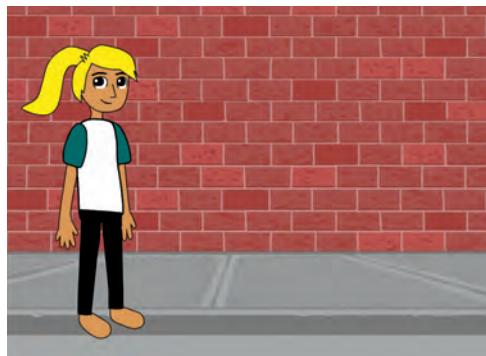
2. Glue the backs together



3. Cut along the dashed line

# Change Styles

Press a key to switch costumes.



Fashion Game

3

SCRATCH

# Change Styles

[scratch.mit.edu/fashion](http://scratch.mit.edu/fashion)



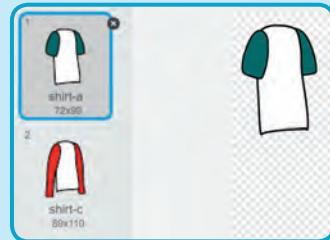
## GET READY

Choose a piece of clothing, like Shirt.

New sprite:



Click the Costumes tab.



## ADD THIS CODE

Click the Scripts tab.



Switch between costumes.



Keep the shirt in front of your character.

## TRY IT

Click the green flag to start.



Press the **space** key to switch between styles.



## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Change Backdrops

Click a button to switch backdrops.



Fashion Game

4

SCRATCH

# Change Backdrops

[scratch.mit.edu/fashion](http://scratch.mit.edu/fashion)



## GET READY



Choose two backdrops.



bedroom1



clothing store

Choose a button sprite, like Arrow1.



Arrow1

## ADD THIS CODE



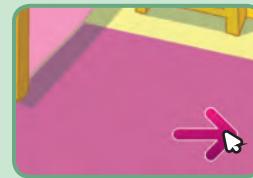
when this sprite clicked

switch backdrop to next backdrop ▾

Choose next backdrop from the menu.

## TRY IT

Click your button to switch backdrops.



## Make a Card



1. Fold the card in half



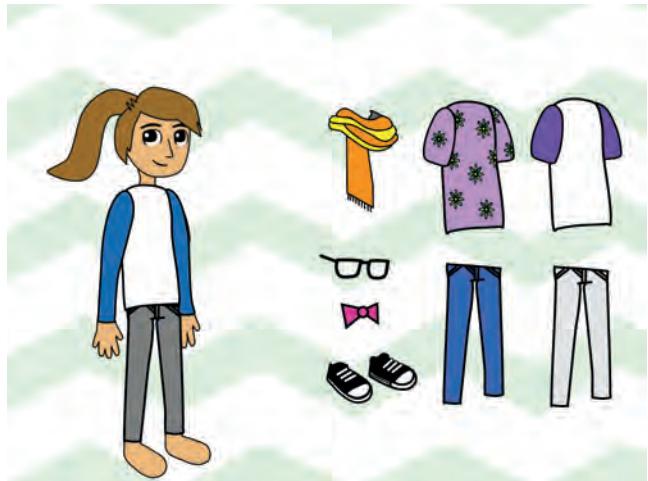
2. Glue the backs together



3. Cut along the dashed line

# Lay Out Your Clothes

Set out your clothes in their starting positions.



Fashion Game

5

SCRATCH

# Lay Out Your Clothes

[scratch.mit.edu/fashion](http://scratch.mit.edu/fashion)

## GET READY

Choose some clothes and accessories.

New sprite:

Arrange them next to your character.

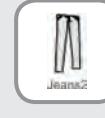


## ADD THIS CODE

Set the starting position for each piece of clothing.  
(Your numbers may be different.)



when green flag clicked  
go to x: 170 y: 70  
go to front



when green flag clicked  
go to x: 170 y: -20  
go to front

## TRY IT

Drag the clothes onto your character.

Click the green flag to reset.



## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Glide into Place

Make accessories glide to the right place.



Fashion Game

6

SCRATCH

# Glide into Place

[scratch.mit.edu/fashion](http://scratch.mit.edu/fashion)



## GET READY

Choose a piece of clothing or an accessory, like Sunglasses1.

New sprite: 🎨 🎨 🎨 🎨



## ADD THIS CODE

Set the starting position.

```
when green flag clicked  
go to x: 170 y: -20  
go to front
```

Drag the sunglasses onto your character and then add the **glide** block.

```
when this sprite clicked  
glide 1 secs to x: -120 y: -60
```

Your numbers may be different.

Click the green flag to reset.



## TRY IT

Click the sunglasses to make them glide to your character.



## Make a Card



1. Fold the card in half



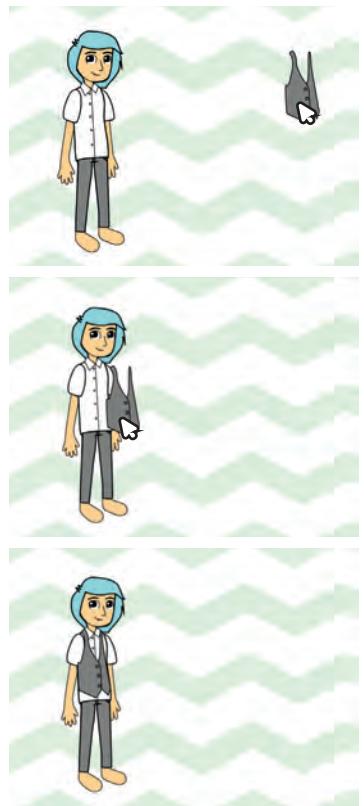
2. Glue the backs together



3. Cut along the dashed line

# Snap into Place

Make clothes snap into place.



Fashion Game

7

SCRATCH

## Snap into Place

[scratch.mit.edu/fashion](http://scratch.mit.edu/fashion)



### GET READY

Choose a piece of clothing or an accessory, like Vest.

New sprite:



### ADD THIS CODE

Drag the clothing onto your character and then add this code.



Choose your character.

Snap onto your character.

Go to starting position.

### TRY IT

Click the green flag to start.



Drag the clothing onto your character. Then it will snap into place!



## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

## Create a Story Cards



Choose characters, add conversation, and bring your story to life.

## Create a Story Cards

Start with the first card and then try the other cards in any order:

- Start a Story
- Show a Character
- Make a Conversation
- Switch Scenes
- Glide to a Spot
- Appear in a Scene
- Make It Interactive
- Add Your Voice
- Click a Button

## Make a Card



1. Fold the card in half



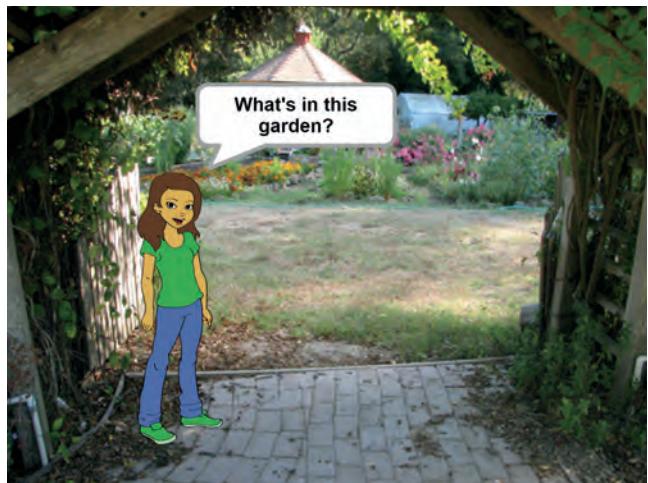
2. Glue the backs together



3. Cut along the dashed line

# Start a Story

Choose a scene and introduce a character.



Create a Story

1

SCRATCH

# Start a Story

[scratch.mit.edu/story](http://scratch.mit.edu/story)

## GET READY

New backdrop:



Choose a backdrop.

New sprite:



Choose a character.

New sprite:



Abby

## ADD THIS CODE



when green flag clicked

switch backdrop to pathway

say What's in this garden? for 2 secs

Type what you want  
your character to say.

## TRY IT

Click the green flag to start.



## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Show a Character

Make a new character appear in the scene.



Create a Story

2

SCRATCH



# Show a Character

[scratch.mit.edu/story](https://scratch.mit.edu/story)

## GET READY

Choose a character.

New sprite:



Click the Sounds tab.

New sound:

Then choose a sound, like fairydust.

## ADD THIS CODE

Click the Scripts tab.

```
when green flag clicked
  hide
  wait (3) secs
  play sound [fairydust v]
  show
```

## TRY IT

Click the green flag to start.



## Make a Card



1. Fold the card in half



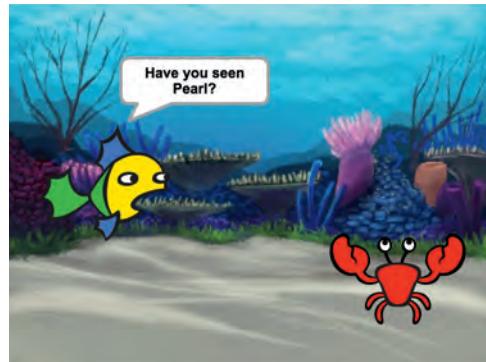
2. Glue the backs together



3. Cut along the dashed line

# Make a Conversation

Make your characters talk with each other.



Create a Story

3

SCRATCH

# Make a Conversation

[scratch.mit.edu/story](http://scratch.mit.edu/story)

## GET READY

Choose two characters.

New sprite:



## ADD THIS CODE



when green flag clicked  
say [Have you seen Pearl? for 2 secs  
say [I can't find her. for 2 secs  
broadcast message1

Broadcast a message.



when I receive message1  
say [Yes! Follow me! for 2 secs

Tell this character what to do when it receives the message.

## TRY IT

Click the green flag to start.



## TIP

broadcast message1  
message1  
new message...

You can click the drop-down menu to add a new message.

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Switch Scenes

Change the backdrop and make something happen.



Create a Story

4

SCRATCH

# Switch Scenes

[scratch.mit.edu/story](https://scratch.mit.edu/story)

## GET READY

New backdrop:



Choose two backdrops.



winter



desert

Choose a character.

New sprite:



Tera

## ADD THIS CODE



when green flag clicked

```
switch backdrop to winter
say Brrrr! It's so cold here! for 2 secs
say I miss the sun. for 2 secs
wait 1 secs
switch backdrop to desert
```

Type what you want your character to say.

Make something happen when the backdrop switches.

when backdrop switches to desert
say Ahh that's better! for 2 secs

## TRY IT

Click the green flag to start.



## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Glide to a Spot

Make a character glide across the screen.



Create a Story

5

SCRATCH

## Glide to a Spot

[scratch.mit.edu/story](https://scratch.mit.edu/story)

### GET READY

New backdrop:



Choose a backdrop.



slopes

Choose a character.

New sprite:



Dog1

### ADD THIS CODE



when green flag clicked

point in direction 120

go to x: -190 y: 60

glide 1 secs to x: -20 y: -170

point in direction 90

Set a starting point.

Glide to another point.

### TIP

Drag your sprite to where you want it and then add a go to or a glide block to your script.



When you drag a sprite, its x and y position will update in the Blocks palette.

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Appear in a Scene

Change the backdrop and  
make a new character appear.



Create a Story

6

SCRATCH

## Appear in a Scene

[scratch.mit.edu/story](https://scratch.mit.edu/story)

### GET READY

New backdrop:

Choose two  
backdrops.



bedroom2



winter

Choose a character.

New sprite:



Bear1

### ADD THIS CODE



Click the Stage  
thumbnail.

New backdrop:

when green flag clicked

switch backdrop to bedroom2

wait [6 secs]

switch backdrop to winter

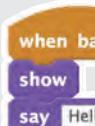
Switch to this scene.



when green flag clicked

hide

Hide at the beginning.



when backdrop switches to winter

show

say [Hello! for 2 secs]

Appear in this scene.

### TRY IT

Click the green flag to start.



## Make a Card



1. Fold the card in half



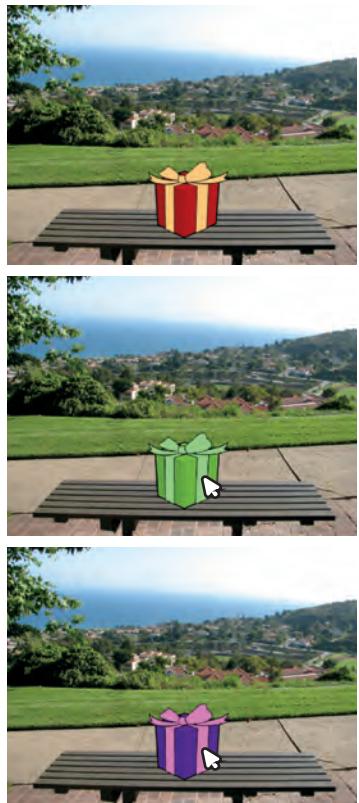
2. Glue the backs together



3. Cut along the dashed line

# Make It Interactive

Click a sprite to make it do something.



Create a Story

7

SCRATCH

## Make It Interactive

[scratch.mit.edu/story](http://scratch.mit.edu/story)

### GET READY

Choose a sprite.

New sprite:



Click the Sounds tab.

New sound:



Then choose a sound from the Sound library.

### ADD THIS CODE

Click the Scripts tab.

when this sprite clicked

play sound fairydust

repeat 10

change color effect by 25

Choose your sound.

You can select different effects from the menu.

### TRY IT

Click your sprite to start.

### TIP



To clear the effect, click the stop sign.

## Make a Card



1. Fold the card in half



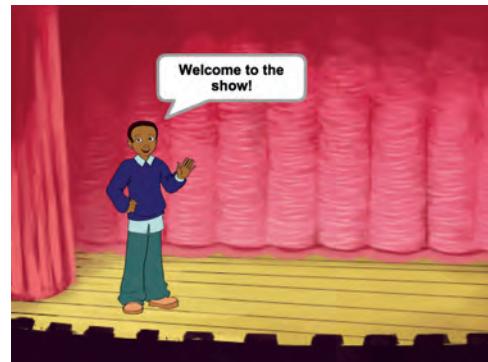
2. Glue the backs together



3. Cut along the dashed line

# Add Your Voice

Record your voice to make a character talk.



Create a Story

8

SCRATCH

## Add Your Voice

[scratch.mit.edu/story](https://scratch.mit.edu/story)

### GET READY

Choose a character.

New sprite:



Devin

Click the Sounds tab.

New sound:

Click this icon.  
(You'll need a microphone.)



Click to record  
your voice.

### ADD THIS CODE

Click the Scripts tab.



### TRY IT

Click the green flag to start.



## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Click a Button

Click a button to switch scenes.



Create a Story

9

SCRATCH

# Click a Button

[scratch.mit.edu/story](https://scratch.mit.edu/story)

## GET READY

New backdrop:



Choose two backdrops.



atom playground



basketball-court1-a

Choose a button sprite, like Arrow1.

New sprite:



Arrow1

## ADD THIS CODE



when this sprite clicked

switch backdrop to next backdrop

hide

wait [3 secs]

show

Choose next backdrop from the menu.

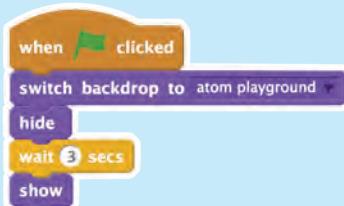
Type how long to wait before showing the button.

## TRY IT

Click your button to start.

## TIP

Add this script to set the first scene. Then click the green flag to start.



## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

## Let's Dance Cards



Design an animated dance scene with music and dance moves.

## Let's Dance Cards

Try these cards in any order:

- Dance Sequence
- Dance Loop
- Play Music
- Take Turns
- Starting Position
- Shadow Effect
- Leave a Trail
- Color Effect
- Bop a Bit
- Interactive Dance

## Make a Card



1. Fold the card in half



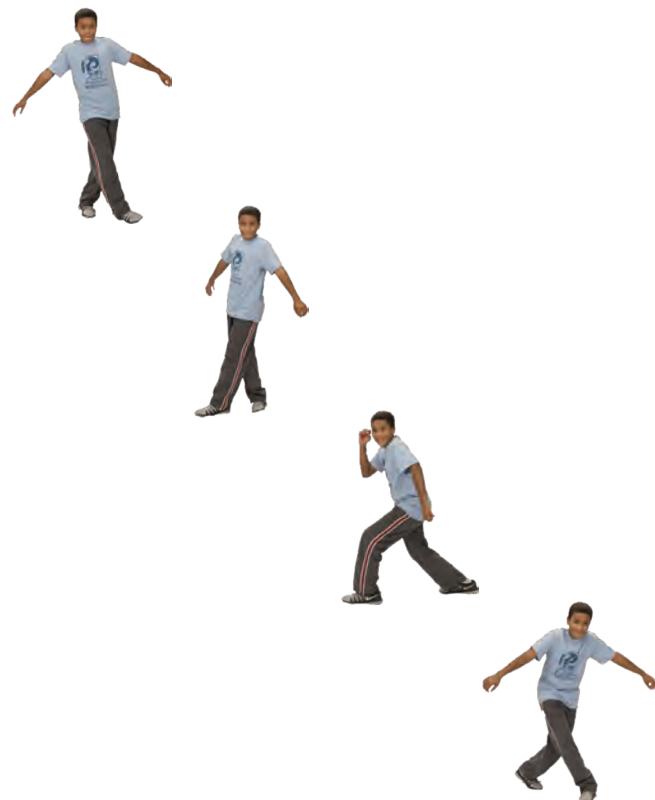
2. Glue the backs together



3. Cut along the dashed line

# Dance Sequence

Make an animated dance.



Let's Dance

1

SCRATCH

## Dance Sequence

[scratch.mit.edu/dance](http://scratch.mit.edu/dance)

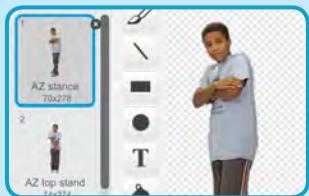
### GET READY

Choose a dancer from the Dance theme.

New sprite:



Click the **Costumes** tab to see the different dance moves.



### ADD THIS CODE

Click the **Scripts** tab.

```
when green flag clicked
  switch costume to [AZ top R step v]
  wait (0.5) secs
  switch costume to [AZ top L step v]
  wait (0.5) secs
  switch costume to [AZ top freeze v]
  wait (0.5) secs
  switch costume to [AZ top R cross v]
  wait (0.5) secs
```

Choose a dance move.

Type how long to wait.

### TRY IT

Click the green flag to start.



## Make a Card



1. Fold the card in half



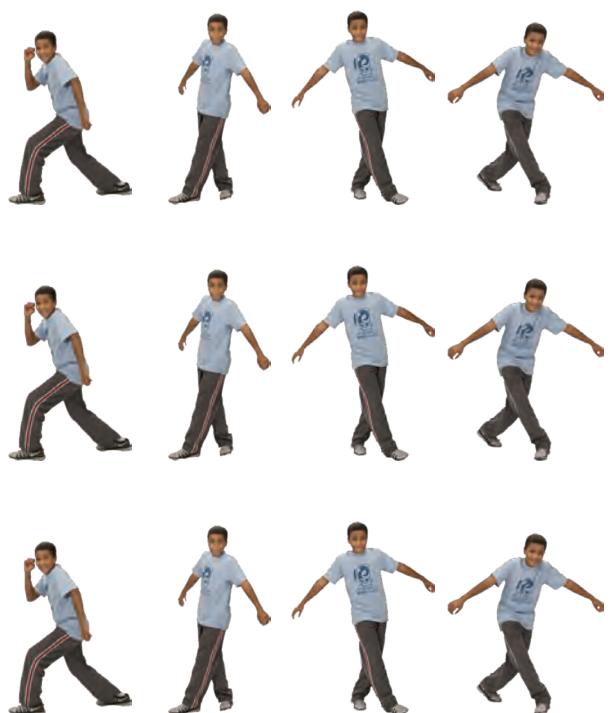
2. Glue the backs together



3. Cut along the dashed line

# Dance Loop

Repeat a series of dance steps.



Let's Dance

2

SCRATCH

# Dance Loop

[scratch.mit.edu/dance](http://scratch.mit.edu/dance)

## GET READY

Choose a dancer from  
the Dance theme.

New sprite:



AZ Hip-Hop

## ADD THIS CODE



Choose a dance pose.  
Type how many times you want to repeat the dance.

## TRY IT

Click the green flag to start.



## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Play Music

Play and loop a song.



Let's Dance

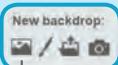
3

SCRATCH

## Play Music

[scratch.mit.edu/dance](http://scratch.mit.edu/dance)

### GET READY

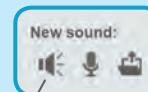


Choose a backdrop.



party room

Click the **Sounds** tab.



Choose a song from the **Music Loops** category.

Or upload an MP3 or other sound file.

### ADD THIS CODE

Click the **Scripts** tab.



Type how many times you want the song to repeat.

### TIP

Make sure to use **play sound <sound> until done** (not **play sound <sound>**) or else the music won't finish playing before it begins again.

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Take Turns

Coordinate dancers so that one begins after the other.



Let's Dance

4

SCRATCH

## Take Turns

[scratch.mit.edu/dance](http://scratch.mit.edu/dance)

### GET READY

Choose two dancers from the Dance theme.

New sprite:



AZ Hip-Hop

Anina Hip-Hop

### ADD THIS CODE



when green flag clicked

switch costume to AZ top L step  
wait 0.5 secs  
switch costume to AZ top R step  
wait 0.5 secs  
switch costume to AZ stance  
broadcast message1

Broadcast a message.



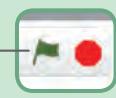
when I receive message1

say My turn to dance! for 2 secs  
repeat (4)  
next costume  
wait 1 secs

Tell this dancer what to do when it receives the message.

### TRY IT

Click the green flag to start.



## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Starting Position

Tell your dancers where to start.



Let's Dance

5

SCRATCH

# Starting Position

[scratch.mit.edu/dance](http://scratch.mit.edu/dance)

## GET READY

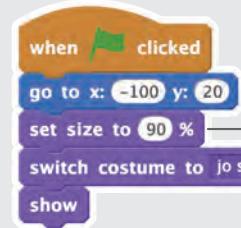
Choose a dancer that you want to start.

New sprite:



Jouvi Hip-Hop

## ADD THIS CODE



Tell it where to start.

Set its size.

Choose the starting costume.

Make sure the sprite is showing (not hiding).

## TIP

Use to set a sprite's position on the Stage.

You can find an x and y position by pointing with the mouse pointer.



## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Shadow Effect

Make a dancing silhouette.



Let's Dance

6

SCRATCH

# Shadow Effect

[scratch.mit.edu/dance](http://scratch.mit.edu/dance)

## GET READY

Choose a dancer from  
the Dance theme.

New sprite:



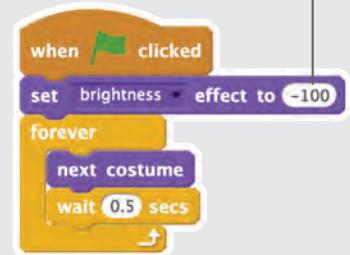
Jouvi Hip-Hop

## ADD THIS CODE

Choose **brightness**  
from the menu.



Set the brightness to **-100**.



## TRY IT

Click the green flag to start.



Click the stop sign to stop.



## Make a Card



1. Fold the card in half



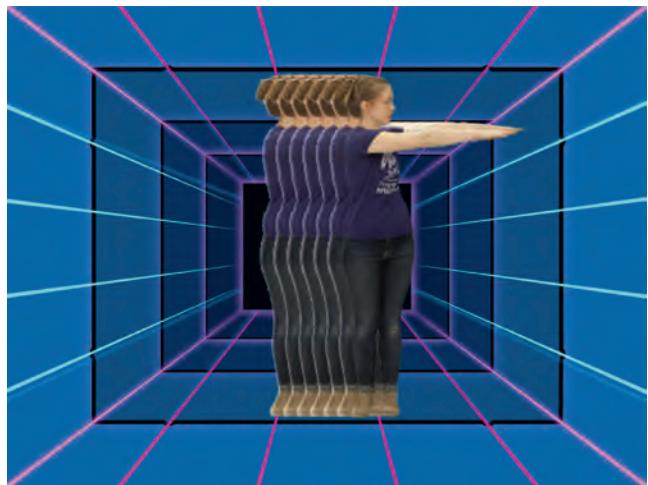
2. Glue the backs together



3. Cut along the dashed line

## Leave a Trail

Stamp a trail as your dancer moves.



Let's Dance

7

SCRATCH

## Leave a Trail

[scratch.mit.edu/dance](http://scratch.mit.edu/dance)

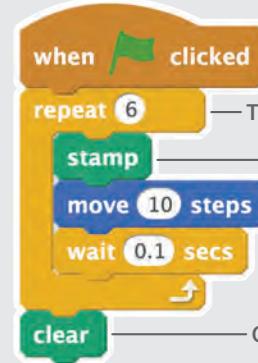
### GET READY

Choose a dancer from  
the Dance theme.

New sprite:



### ADD THIS CODE



Type how many times to repeat.  
Stamp the current costume on the Stage.

Clear all the stamps.

### TRY IT

Click the green flag to start.



## Make a Card



1. Fold the card in half



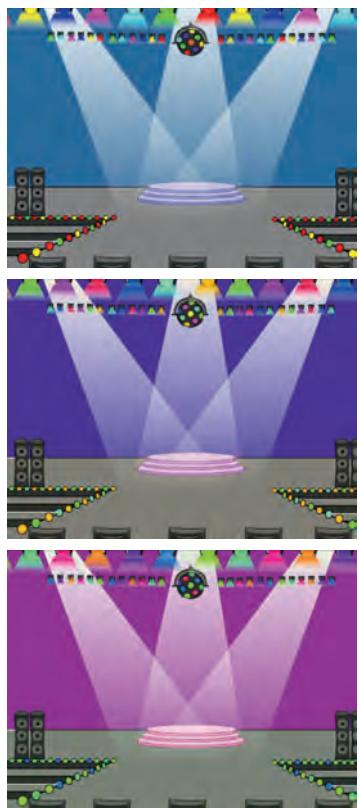
2. Glue the backs together



3. Cut along the dashed line

# Color Effect

Make the backdrop change colors.



Let's Dance

8

SCRATCH

# Color Effect

[scratch.mit.edu/dance](http://scratch.mit.edu/dance)

## GET READY

New backdrop:

Choose a backdrop.



## ADD THIS CODE

Click the **Scripts** tab.



```
when green flag clicked
  forever
    change color effect by (25)
    wait (0.5) secs
```

Try different numbers.

## TRY IT

Click the green flag to start.



## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Bop a Bit

Move your dancer up and down  
a little to look lively.



Let's Dance

9

SCRATCH

# Bop a Bit

[scratch.mit.edu/dance](http://scratch.mit.edu/dance)

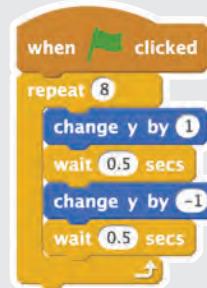
## GET READY

Choose a dancer from  
the Dance theme.

New sprite:

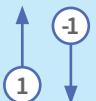


## ADD THIS CODE

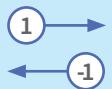


- Type a positive number to move up.
- Type a negative number to move down.

## TIP



To move up or down, you can use .



To move left or right, you can use .

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Interactive Dance

Press keys to switch dance moves.



Let's Dance

10

SCRATCH

# Interactive Dance

[scratch.mit.edu/dance](http://scratch.mit.edu/dance)

## GET READY

Choose a dancer from  
the Dance theme.

New sprite:



Jouvi Hip-Hop

## ADD THIS CODE

when left arrow key pressed  
switch costume to jo pop left

when right arrow key pressed  
switch costume to jo pop right

when up arrow key pressed  
switch costume to jo top stand

when down arrow key pressed  
switch costume to jo pop down

## TRY IT

Press the arrow keys to make your dancer move.

## Make a Card



1. Fold the card in half

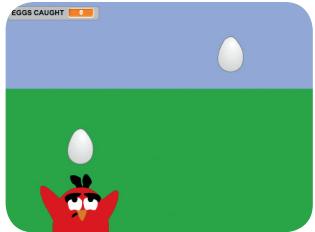
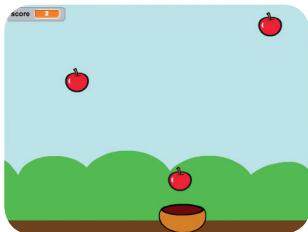


2. Glue the backs together



3. Cut along the dashed line

## Catch Game Cards



Make a game where you catch things falling from the sky.

[scratch.mit.edu/catch](https://scratch.mit.edu/catch)

SCRATCH

[scratch.mit.edu/catch](https://scratch.mit.edu/catch)

SCRATCH

## Catch Game Cards

Use these cards in this order:

- 1 Go to the Top
- 2 Fall Down
- 3 Move the Catcher
- 4 Catch It!
- 5 Keep Score
- 6 Bonus Points
- 7 You Win!

## Make a Card



1. Fold the card in half



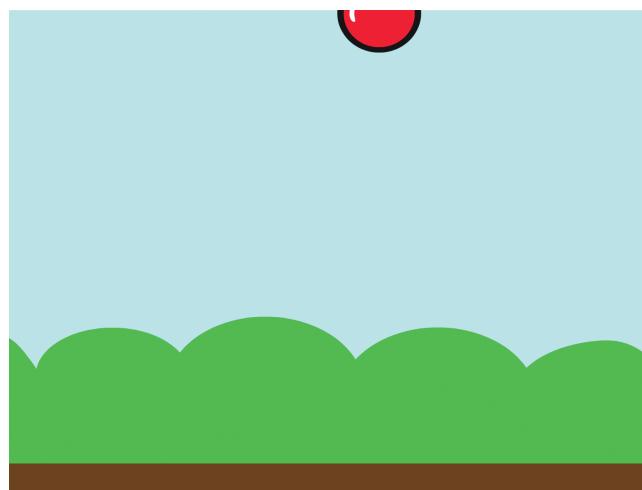
2. Glue the backs together



3. Cut along the dashed line

# Go to the Top

Start from a random spot  
at the top of the Stage.



Catch Game

1

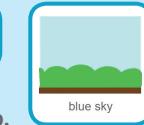
SCRATCH

# Go to the Top

[scratch.mit.edu/catch](http://scratch.mit.edu/catch)

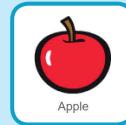
## GET READY

New backdrop:



Choose a backdrop.

Choose a sprite, like Apple.



Apple

## ADD THIS CODE

Choose random position  
from the menu.



Type 180 to go to the  
top of the Stage.

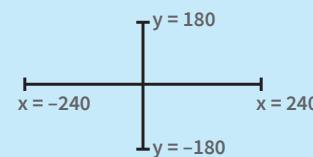
## TRY IT

Click the green flag to start.



## TIP

y is the position on the Stage from top to bottom.



## Make a Card



1. Fold the card in half



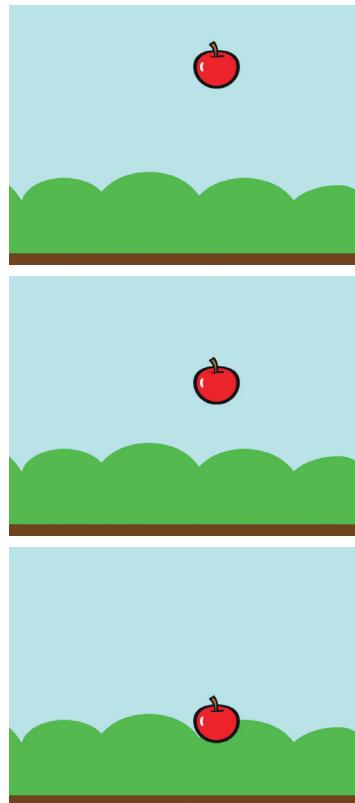
2. Glue the backs together



3. Cut along the dashed line

# Fall Down

Make your sprite fall down.



Catch Game

2

SCRATCH

# Fall Down

[scratch.mit.edu/catch](http://scratch.mit.edu/catch)

## GET READY



Click to select the Apple.

## ADD THIS CODE

```
when green flag clicked
  forever
    change y by -5
    if < y position < -170 then
      go to random position
      set y to 180
    end
```

Type a negative number  
to fall down.

Check if near the  
bottom of the Stage.  
Go back to the top of the Stage.

## TRY IT

Click the green flag to start. Click the stop sign to stop.



## TIP

Use `change y by` to move up or down.

Use `set y to` to set the sprite's vertical position.

## Make a Card



1. Fold the card in half



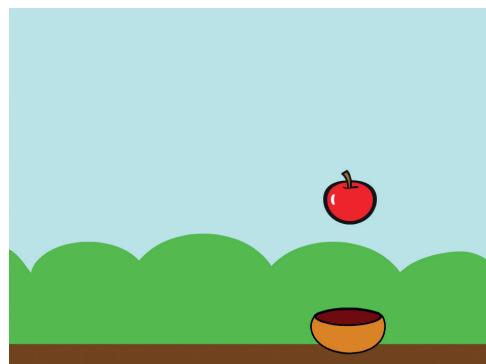
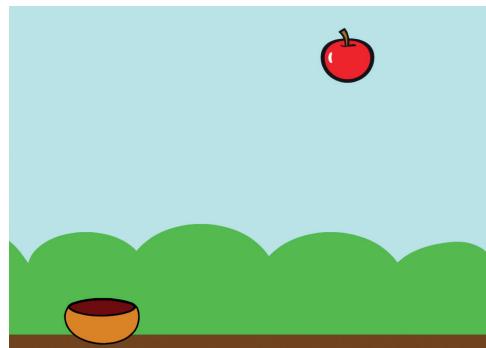
2. Glue the backs together



3. Cut along the dashed line

## Move the Catcher

Press the arrow keys so that  
the catcher moves left and right.



Catch Game

3

SCRATCH

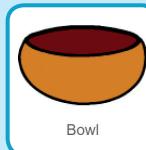
## Move the Catcher

[scratch.mit.edu/catch](http://scratch.mit.edu/catch)

### GET READY

Choose a catcher,  
like Bowl.

New sprite:



Bowl

Drag the Bowl to the bottom of the Stage.

### ADD THIS CODE

```
when green flag clicked
forever
  if key right arrow pressed? then
    change x by 10
  end
  if key left arrow pressed? then
    change x by -10
  end
```

### TRY IT

Click the green  
flag to start.



Press the arrow keys to  
move the catcher.

## Make a Card



1. Fold the card in half



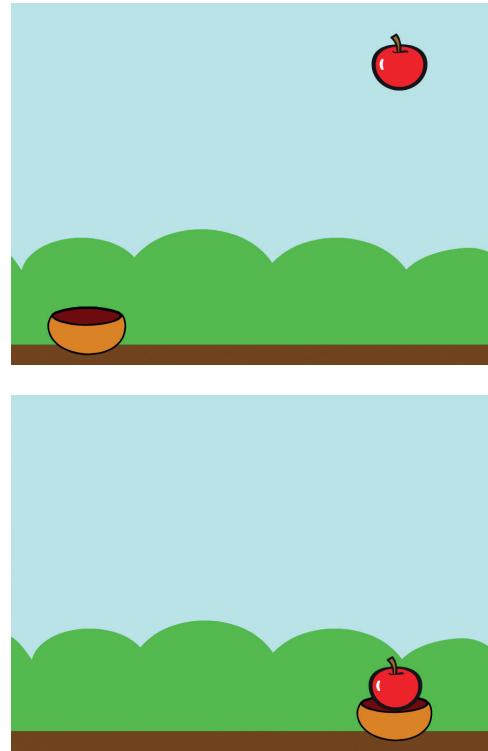
2. Glue the backs together



3. Cut along the dashed line

## Catch It!

Catch the falling sprite.



Catch Game

4

SCRATCH

## Catch It!

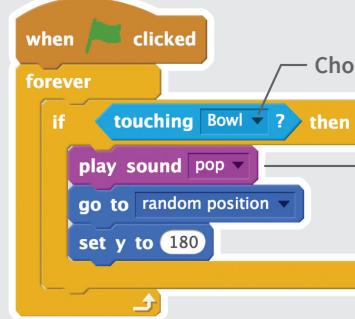
[scratch.mit.edu/catch](http://scratch.mit.edu/catch)

### GET READY



Click to select the Apple.

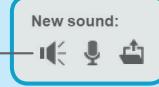
### ADD THIS CODE



### TIP

If you want to add a different sound, click the **Sounds** tab.

Then choose a sound from the Sound library.



## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Keep Score

Add a point each time you catch the falling sprite.



Catch Game

5

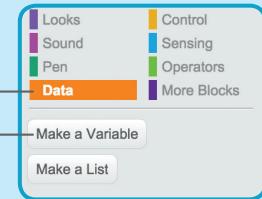
SCRATCH

# Keep Score

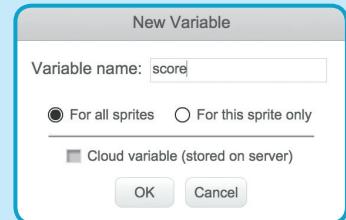
[scratch.mit.edu/catch](http://scratch.mit.edu/catch)

## GET READY

Choose Data.



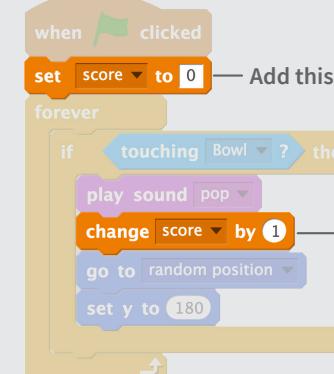
Click the **Make a Variable** button.



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

## ADD THESE BLOCKS

Add two new blocks to the script you made:



Add this block to reset the score.

Add this block to increase the score.

## TRY IT

Catch apples to score points!

## Make a Card



1. Fold the card in half



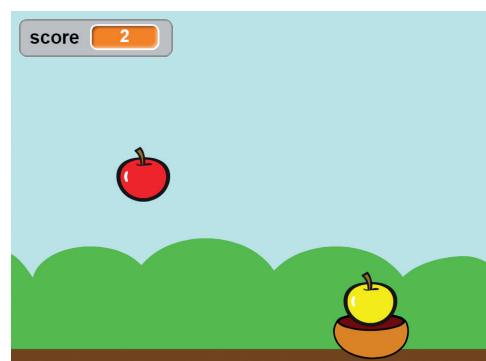
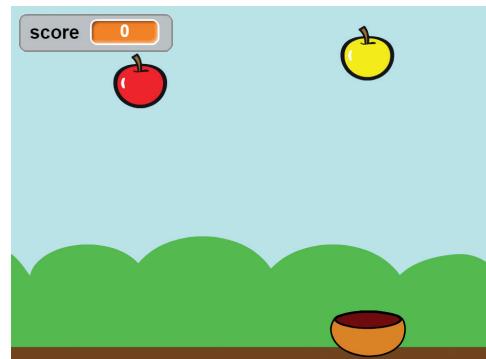
2. Glue the backs together



3. Cut along the dashed line

# Bonus Points

Get extra points when you catch a golden sprite.



Catch Game

6

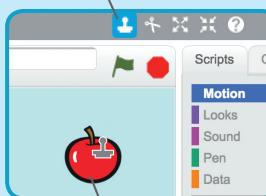
SCRATCH

# Bonus Points

[scratch.mit.edu/catch](http://scratch.mit.edu/catch)

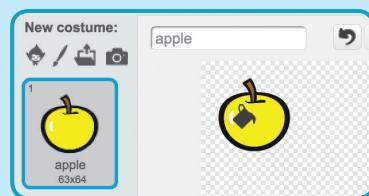
## GET READY

Choose the **Duplicate tool**.



Click your sprite to duplicate it.

Click the **Costumes** tab.



You can use the paint tools to make your bonus sprite look different.

## ADD THIS CODE

Click the **Scripts** tab.



```
when green flag clicked
set [score v] to [0]
forever
  if [touching Bowl?]
    then
      play sound [pop v]
      change [score v] by [2]
      go to [random position v]
      set [y] to [180]
```

Type how many points for the bonus sprite.

## TRY IT

Catch your bonus sprite to increase your score!

## Make a Card



1. Fold the card in half



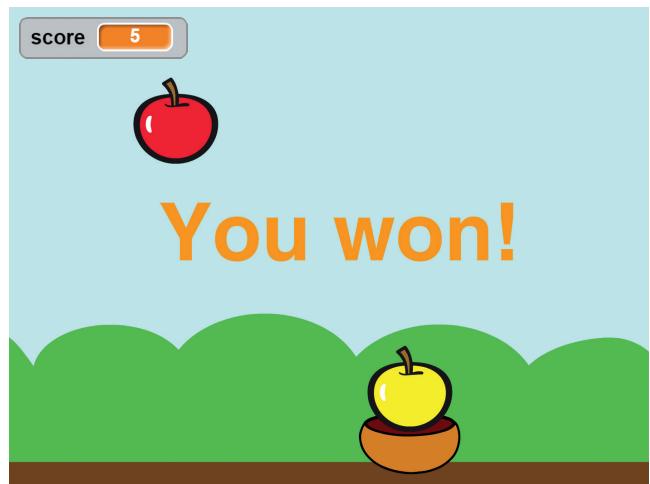
2. Glue the backs together



3. Cut along the dashed line

# You Win!

When you score enough points,  
display a winning message!



Catch Game

7

SCRATCH

# You Win!

[scratch.mit.edu/catch](http://scratch.mit.edu/catch)

## GET READY

Click the paintbrush  
to draw a new sprite.

New sprite:

Bitmap Mode

Click the **Convert  
to vector** button.

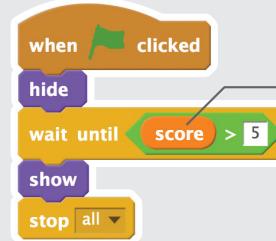
Use the **Text** tool to write  
a message, like "You won!"

**You won!**

You can change the font  
color, size, and style.

## ADD THIS CODE

Click the **Scripts** tab.



Insert the **score** block.

Click the green  
flag to start.

## TRY IT

Play until you score  
enough points to win!

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

## Virtual Pet Cards



Create an interactive pet that can eat, drink, and play.

[scratch.mit.edu/pet](https://scratch.mit.edu/pet)

SCRATCH

[scratch.mit.edu/pet](https://scratch.mit.edu/pet)

SCRATCH

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Introduce Your Pet

Choose a pet and have it say hello.



Virtual Pet

1

SCRATCH

# Introduce Your Pet

[scratch.mit.edu/pet](http://scratch.mit.edu/pet)

## GET READY

New backdrop:

Choose a backdrop.



garden rock

Choose a pet.

New sprite:



Monkey2

## ADD THIS CODE

Drag your pet to where you want it on the Stage.

```
when green flag clicked
  go to x: -60 y: 80
  say [My name is Kiki!] for [1] secs
```

Set its position.  
(Your numbers  
may be different.)

Type what your pet will say.

## TRY IT

Click the green flag to start.



## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Animate Your Pet

Bring your pet to life.



Virtual Pet

2

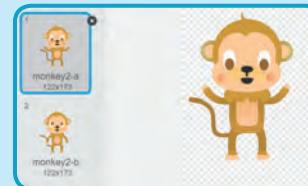
SCRATCH

# Animate Your Pet

[scratch.mit.edu/pet](http://scratch.mit.edu/pet)

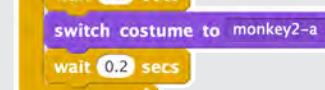
## GET READY

Click the **Costumes** tab to see your pet's costumes.



## ADD THIS CODE

Click the **Scripts** tab.



## TRY IT

Click your pet to start.

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Feed Your Pet

Click the food to feed your pet.



Virtual Pet

3

SCRATCH

## Feed Your Pet

[scratch.mit.edu/pet](http://scratch.mit.edu/pet)

### GET READY



Click the Sounds tab.



Choose a sound from the Sound library, like chomp.

Choose a food sprite.

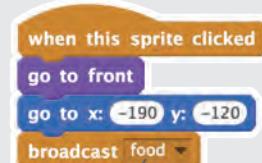
New sprite:



### ADD THIS CODE

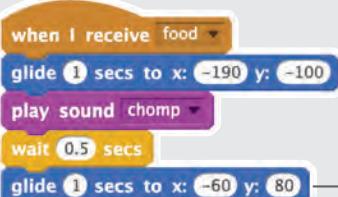


Select a new message and name it food.



Broadcast the food message.

Tell your pet what to do when it receives the message.



Glide to the food.

Glide back.

### TRY IT

Click the food to start.

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# Give Your Pet a Drink

Give your pet some water to drink.



1)

Virtual Pet

4

SCRATCH

# Give Your Pet a Drink

[scratch.mit.edu/pet](http://scratch.mit.edu/pet)

## GET READY

Choose a drink sprite,  
like Glass Water.

New sprite:



## ADD THIS CODE



```
when this sprite clicked
  go to front
  go to x: -80 y: -120
  broadcast drink
  wait 1 secs
  switch costume to glass water-b
  play sound water drop
  wait 1 secs
  switch costume to glass water-a
```

Broadcast a new message.

Switch to the  
empty glass.

Switch to the full glass.

Tell your pet what to do when it receives the message.



```
when I receive drink
  glide 1 secs to x: -80 y: -100
  wait 1 secs
  glide 1 secs to x: -60 y: 100
```

Glide to the drink.

Glide back.

## TRY IT

Click the drink to start.

## Make a Card



1. Fold the card in half



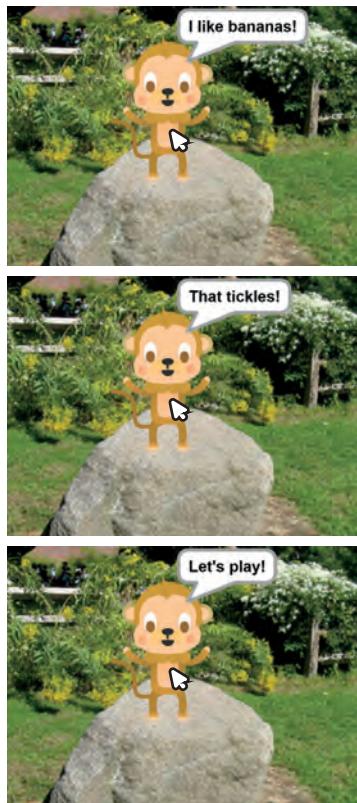
2. Glue the backs together



3. Cut along the dashed line

# What Will It Say?

Let your pet choose what it will say.



Virtual Pet

5

SCRATCH

# What Will It Say?

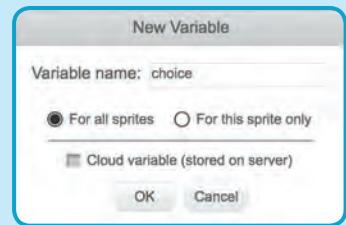
[scratch.mit.edu/pet](http://scratch.mit.edu/pet)

## GET READY

Choose Data.



Click the Make a Variable button.



Name this variable choice and then click OK.

## ADD THIS CODE



Insert the pick random block.  
Insert the choice block.  
Type what you want your pet to say.

## TRY IT

Click your pet to see what it says.

## Make a Card



1. Fold the card in half



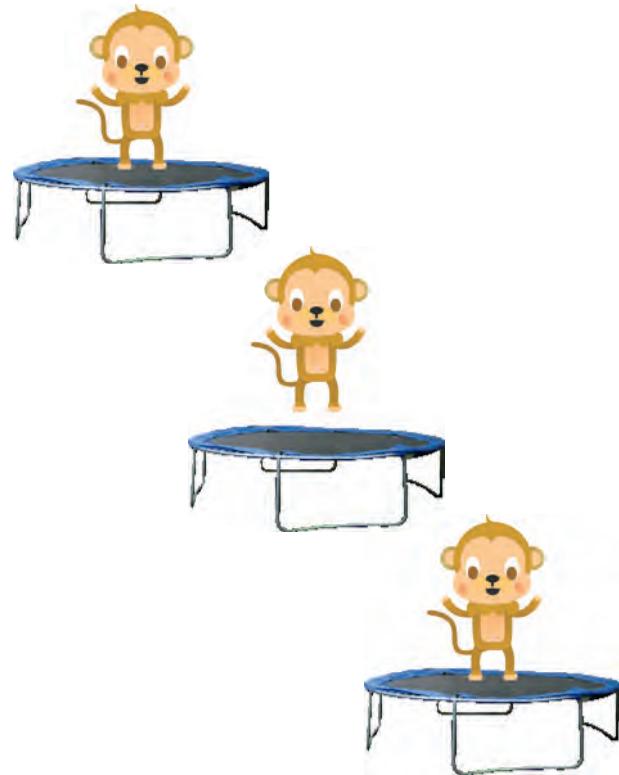
2. Glue the backs together



3. Cut along the dashed line

# Time to Play

Have your pet jump on a trampoline.



Virtual Pet

6

SCRATCH

# Time to Play

[scratch.mit.edu/pet](http://scratch.mit.edu/pet)

## GET READY

Choose the Trampoline.

New sprite:



Trampoline

## ADD THIS CODE



when this sprite clicked  
go to x: 130 y: -120  
broadcast play



when I receive play  
go to front  
glide 1 secs to x: 120 y: -40  
repeat (4)  
change y by 20  
wait 0.3 secs  
change y by -20  
wait 0.3 secs  
glide 1 secs to x: -60 y: 100

A positive number makes your pet jump up.

A negative number brings your pet back down.

## TRY IT

Click the trampoline.

## Make a Card



1. Fold the card in half



2. Glue the backs together



3. Cut along the dashed line

# How Hungry?

Keep track of how hungry your pet is.



Virtual Pet

7

SCRATCH

# How Hungry?

[scratch.mit.edu/pet](http://scratch.mit.edu/pet)

## GET READY



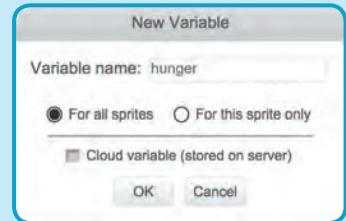
Monkey2

First, add food using the **Feed Your Pet** card.  
Then, click to select your pet.

Choose Data.

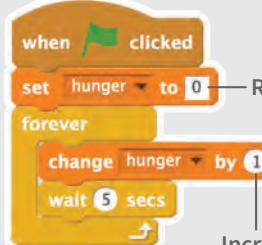


Click the **Make a Variable** button.



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

## ADD THIS CODE



Reset hunger level.

Increase hunger level.



Type a negative number  
to make your pet less  
hungry.

## TRY IT

Click the green  
flag to start.



Then click  
the food.

