EDUCATOR GUIDE

Race to the Finish

With this guide, you can plan and lead a one-hour workshop using Scratch. Participants will make a game where characters race each other.

Workshop Overview

Here’s a suggested agenda for a one-hour workshop:

IMAGINE
10 minutes

First, gather as a group to introduce the theme and spark ideas.

CREATE
40 minutes

Next, help participants as they make racing games, working at their own pace.

SHARE
10 minutes

At the end of the session, gather together to share and reflect.
Imagine

Begin by gathering the participants to introduce the theme and spark ideas for projects.

Warm-up Activity: Scratch Cat Says

The group game ‘Scratch Cat Says’ is a fun way to get to know Scratch blocks. Use large-size, printed Scratch blocks with actions (such as move, turn, and play sound). To play the game, the leader holds up a block. If the leader calls out ‘Scratch cat says’ and then the block name, then everyone should do the action. If the leader just says the block name without saying ‘Scratch cat says’, then anyone who does the action is out of the game. The last person remaining wins the game!

Provide Ideas and Inspiration

To spark ideas, show a couple of examples of racing games from the Race to the Finish Studio on the Scratch website.

Race to the Finish Studio

View the studio at scratch.mit.edu/studios/3547262/

Get Ready for the Workshop

Use this checklist to prepare for the workshop.

- Preview the Tutorial
  The Race to the Finish tutorial shows participants how to create their own projects. Preview the tutorial before your workshop and try the first few steps: scratch.mit.edu/racegame

- Print the Activity Cards
  Print a few sets of Race to the Finish cards to have available for participants during the workshop. scratch.mit.edu/racegame/cards

- For the warm-up activity, print out large Scratch blocks
  For the ‘Scratch Cat Says’ warm-up activity, print out Scratch blocks with actions participants can do (such as move 2 steps, turn 90 degrees, and say Hello! for 2 secs). You can download a folder with printable blocks here: bit.ly/scratchblocks-to-print

- Make sure participants have Scratch accounts
  Participants can sign up for their own Scratch accounts or you can set up student accounts if you have a Teacher Account. To request a Teacher Account, go to: scratch.mit.edu/educators

- Set up computers or laptops

- Set up a computer with projector or large monitor
Demonstrate the First Steps

Demonstrate the first few steps of the tutorial so participants can see how to get started.

Go to Scratch to create a new project. Choose a backdrop.

Select the cat sprite, or choose a new sprite to race.

Make your sprite move when you press a key.

Create

Support participants as they create racing games. Suggest working in pairs.

Start with Prompts
Ask participants questions to get started

What sprites would you like to race in your game? Do you want to choose animals, people, or something else?

Provide Resources
Offer options for getting started

Some participants may want to follow the online tutorial: scratch.mit.edu/racegame

Others may want to explore using the printed activity cards.

Suggest Ideas for Starting
• Choose a backdrop
• Choose or draw a sprite to race and make it move with a key press
• To reset your sprite, make it go to the starting point
• Add a finish line
More Things to Try

- Choose a new sprite to add to the race
- Program it to move using a different key press
- Add a sound when the winner crosses the finish line

Creating Together

Encourage ‘pair programming’, where participants work together to create a program. Notice how they are working together. At regular intervals, call out for the pairs to switch who is using the mouse and keyboard to make sure that each person is contributing to the process.

Talk It Through

If participants gets stuck, talk with them to figure out what happened and what they hoped to have happen. Then brainstorm together some things to try.

- Can you show me what your project is doing now?
- Is it working how you expected?
- What will you try next?

Prepare to Share

To add instructions and credits to a project online, click the button: ‘See project page’. This video shows how to share a project on the Scratch website: vimeo.com/llk/share

Share

Try out each other’s racing games. Play one of the games together, then switch and try the other game.

Ask questions they can discuss:

- What did you notice about the games you tried?
- What ideas might you add to your game?

What’s Next?

The Race to the Finish projects provide an introduction to creating games in Scratch. Here are a few ways that participants can build on the concepts they learned from this project.

- Olympic Sports
  Suggest making a project that features an Olympic sport. It could be a variation on racing, such as swimming, rowing or skiing. (For examples, see the Rio Olympics Studio: scratch.mit.edu/studios/1509358/)

- Underwater Race
  Make an underwater race. Choose (or draw) an ocean backdrop, then choose and program sea creatures to race.

Scratch is a project of the Lifelong Kindergarten Group at the MIT Media Lab.