

Lesson 4: Modify Sprites



By the end of the lesson, students will be able to

- ✓ Debug their projects
- ✓ Modify existing sprites and create some simple sprites

Things to do before the class

- ✓ Make a list of usernames and passwords for each group's Scratch account. Some students might not remember their usernames or passwords.
- ✓ Read the student guide and engage with the given activities.
- ✓ Have a whiteboard and marker to write things down.
- ✓ Read the lesson plan and watch the videos linked inside. These videos are meant for teachers to help them learn Scratch as they run these lessons for their students.
- ✓ Make sure all the computers that the students will use have decent internet connection.



0. Access the student guide (5 mins)

- ✓ Ask students to type this URL in the address bar: cd8.notion.site

Note: Because students have typed the address in the last class, the browser will usually auto complete the address when they type the first few characters.

1. Debugging exercise (10 mins)

Ask students to read till the **Let's start with debugging!** section (page 1 to 3). Remind them that errors in codes are called bugs, and debugging simply is the process to fix the bugs.

Let them debug any one of the two given projects. Both projects are based on the previous lesson on creating conversations.

- ✓ Provide hints if needed but avoid giving direct solutions.
- ✓ It's okay if students aren't able to debug their projects. They can work on them later in their spare time.
- ✓ Some students will debug their projects sooner than their peers. Ask them to try debugging the other project too.

Note: Some students might not know how to get back to the student guide after opening one of these projects. Inform them that they need to click on the **back button** at the top left part of the browser.





2. Getting ready for the lesson (5 mins)

Ask students to read the **Getting ready for the lesson** section (page 5). They should

- ✓ **Sign in to student accounts**
Students might need help with entering correct passwords and CAPTCHA
- ✓ **Change color mode to high contrast**

Reading the default Scratch blocks (white text) can be stressful to the eyes. High contrast blocks are much easier to read.

3. Let's modify sprites (60 mins)

Ask students to go through the **Let's modify sprites** section (page 4 to 7). It has instructions, challenges and suggestions to help them learn modifying sprites.

5 challenges are given here. Each challenge makes students use certain tools and techniques. Students don't need to complete all the challenges. They can continue working on them during their leisure or in other lessons.

Watch this video to learn more about modifying sprites: [Remix and Re-imagine Scratch Sprites | Tutorial](#)

Note: Some students might finish all the challenges before the given time. Ask them to work on the **More things to explore section**.



4. More things to explore (Optional)

This section helps you differentiate learning in your class. Ask students, who completed all 5 challenges, to go through the **More things to explore** section (page 7). Let them create sprites reflecting their culture and identity.

Watch these videos to learn more about creating sprites in Scratch:

- ✓ [Create a Sprite with the Scratch Paint Editor | Tutorial](#)
- ✓ [How to Make a Character Designer in Scratch | Tutorial](#)

Similar to drawing sprites, you can also draw your own backdrops in Scratch. Watch this video to learn more: [How to Draw Backdrops in Scratch | Tutorial](#)

If you need to repeat this lesson for the class, some students who have already learnt it can work on this section, or work on the challenges, or bugs they couldn't complete.

5. Reflection (10 mins)

Ask students to go through the **Let's Reflect** section (page 7). Ask students to think on the questions and discuss with their group member.

Note: *It's helpful if you can provide them with pen and paper to write their reflections.*

Before students leave, ask them to exchange their reflections with two students other than their group member.