

Imaginative Sparks Generator

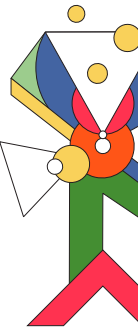
Questions to inspire imaginative thinking

Open-ended questions that draw on the imagination

- ▶ Use the following [Question Starts](#)¹ to help you and your students brainstorm interesting questions about a topic:
 - ▽ Why...?
 - ▽ What are the reasons...?
 - ▽ Suppose that...
 - ▽ What if...?
 - ▽ What is the purpose of...?
 - ▽ What if we knew...?
 - ▽ Imagine...
 - ▽ How would it be different if...?
 - ▽ What would change if...?
- ▶ Ask questions that invite children to take different perspectives, such as, “What would the weather report sound like from a [worm’s] perspective?”, “What would [the exhaust pipe] say if it could talk?”
- ▶ Show the class or a small group a photograph, object, or drawing, and ask them what they think it is. Have students ask each other, in turn, “[What else could it be?](#)”² Afterward, ask them to reflect on what they learned about using their imaginations.
- ▶ When studying the natural or physical environment, invite students to use their imaginations, e.g., when learning about animal habitats, ask students to create their own animal that might thrive in a particular environment. When studying transportation, ask students to design new ways they could get from home to school.

Provocations that trigger the imagination

- ▶ Put a work of art, intriguing quote, or provocative question related to the topic you are studying on the wall to inspire wonder in the classroom. Provide post-it notes and a pencil for students to share their thinking and wondering over time.
- ▶ Juxtapose two items or ideas that are not typically paired. For example, pair cut and dying flowers with a bean seed sprouting or a growing plant, or pair voting laws and sports rules. Ask students what they notice and what they imagine about possible connections.
- ▶ Choose an object or system related to a topic you are studying (e.g., the body, an automobile factory, or a branch of government). Ask learners to identify its parts, purposes, and the people who interact with it. Pose one or more of the following questions: “In what ways could it be made more effective? ...efficient? ...ethical? ...beautiful?” (See the [Imagine If...](#)³ thinking routine.)



Tips for Using This Tool

- ▶ Play is activated by just the right amount of novelty and surprise. Too little novelty can lead to boredom; too much can create anxiety. Monitor learner engagement when posing the above questions or provocations over time. Involve learners in deciding what to repeat and vary.
- ▶ Other examples of questions that invite perspective-taking include: “How might [your grandchildren] respond to this question fifty years from now?” “What would [the flower] look like if you were high up on a ladder?”
- ▶ Brainstorm additional questions that invite perspective-taking with your colleagues and/or students.
- ▶ If learners develop a concept or theory based on their imagination that does not reflect reality, rather than correcting them, hold them accountable to the logic or parameters of the task or question within their own description.
- ▶ Design is everywhere! Ask learners, in pairs or trios, to go on a [Design Hunt](#)⁴ around the classroom, school, or neighborhood to find designed objects or systems. Ask them to photograph or sketch the object or system and share: 1) what they notice; 2) what they think the designer considered when creating the object or system; 3) how they might redesign it and why.

Notes

1. **Creative Question Starts** is a thinking routine from Project Zero (also available in Spanish). Available at: www.pz.harvard.edu/resources/creative-question-starts
2. **What Else Could It Be?** is an Inspiring Inventiveness tool, co-developed by Opal School (U.S.) and Project Zero. Available at: www.pz.harvard.edu/resources/what-else-could-it-be
3. **Imagine If...** is a thinking routine developed by the Agency by Design project at Project Zero (also available in Spanish). Available at: www.pz.harvard.edu/resources/imagine-if
4. **Design Hunt** was developed by the Agency by Design project at Project Zero. See www.agencybydesign.org/sites/default/files/AbD%20Design%20Hunt%20.pdf