Lesson Outcomes
- Students will understand that seeds and seedlings need water to grow
- Students will create a tool that can be used in the Learning Garden to water seeds and seedlings

Materials and Preparation
- Used plastic bottle with cap, preferably one with handles, 1 per student or student pair
- Thumb tack or a drill with a 1/8” drill bit
- Water source (indoor or outdoor)
- Craft supplies, optional, for decorating plastic bottles
- Review the activity and prepare one example Upcycled Watering Can

Teacher Background
The Upcycled Watering activity features a spill-free watering technique that is an effective and safe way to water your Learning Garden with all of your students at one time. Students create a watering tool that can be reused in the Learning Garden each time you visit. Students will learn the proper way to water seeds and seedlings, and teachers will have a manageable, hands-on opportunity to discuss plant care and the water cycle with the entire class. In addition, teachers can introduce sustainable practices through upcycling something that may have otherwise been recycled or thrown away.

Introduction
Let your students know that they will soon be watering your Learning Garden and, to prepare, will be making a tool today to help make sure we safely and efficiently water your entire Learning Garden.

Ask students to explain why they think that seeds and seedling need water to grow. Solicit responses and if appropriate, encourage students to think about why they need water.

Classroom Activity
Divide students into pairs and pass out the Upcycled Watering Can supplies to each student.

Show students the example Upcycled Watering Can and let students know they will be making their own to use in the Learning Garden. The Upcycled Watering Can will ensure we safely and carefully water our seeds and seedlings!

Instruct students to visit the front of the classroom, one or two groups at a time, to pierce holes on the front and near the top of the handle (for air passage) of the plastic bottle. If students are older, allow them to handle the drill or the thumb tacks. Younger students will need more assistance, and you may consider prepping the holes prior to class.

While students are visiting the front of the classroom, instruct the other students to begin decorating their Upcycled Watering Can using the coloring and craft supplies.
Fill the plastic bottle with water and loosely screw on the bottle cap.

**Conclusion**

Have students share out key parts of today’s discussion and review the Activity Outcomes. Students should clean-up the classroom as needed.

**Classroom Extension**

**Standards Alignment**

**Common Core – English Language Arts**

- W.2.2. Write informative/explanatory texts in which they introduce a topic, use facts and definitions to develop points, and provide a concluding statement or section.
- W.3.2. Write informative/explanatory texts to examine a topic and convey ideas and information clearly.
- W.4.2. Write informative/explanatory texts to examine a topic and convey ideas and information clearly.
- W.5.2. Write informative/explanatory texts to examine a topic and convey ideas and information clearly.
- WHST.6-8.2. Write informative/explanatory texts, including the narration of historical events, scientific procedures/ experiments, or technical processes.

**Lesson Ideas:**

2\textsuperscript{nd}–4\textsuperscript{th} grades: Have students verbally explain and then write the process for creating an Upcycled Watering Can.

  **Prompt:** How would you explain how to create an upcycled watering can to someone who has never done this before?

4\textsuperscript{th}–6\textsuperscript{th} grades: Have students write a comparison of different watering methods. After reading Gardening Basics – Wise Watering by KidsGardening.org, have students compare and contrast the different watering methods they read about and/or the different watering methods used in your school Learning Garden (Little Rainclouds, Upcycled Watering can, irrigation system).

  **Prompt:** Compare and contrast at least two different watering methods. Identify a situation in which each watering method would be the most appropriate.