



GARDENS OF HOPE
JOSEPH P. CORY FOUNDATION

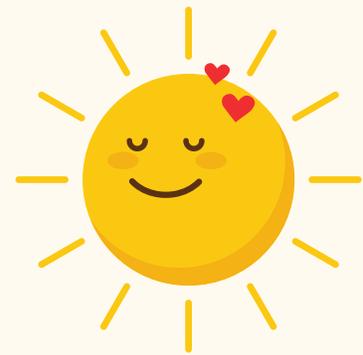
Toolbox

READY, SET, GROW!



TABLE OF CONTENTS

1. **Toolbox Cover**
2. **Table of Contents**
3. **The Importance of School Gardens**
4. **Pre/Post Assessment**
5. **Lesson Learning Objectives for Ready, Set, Grow!**
6. **Plant Life-Cycle Worksheet**
7. **5 Things Plants Need to Grow**
8. **Starting Your Seeds Indoors**
9. **How to Read "Seed Talk"**
10. **Seed Prediction Growth Chart**
11. **Ruler and Measurement Graph**
12. **Contact Information**



Dear Parents, Guardians, Educators - Our Students Need Your Help!

- **1 in 5 school-aged children is obese**
- **Obesity results in diseases that were once considered adult-limited**

School (as well as home) gardens represent a unique opportunity to influence childhood health outcomes by providing an empowering setting. Early exposure to fruits, vegetables, herbs, and hands-on nutrition education, cultivates an early appreciation for healthy food. Previous studies have suggested strategies to improve childhood fruit and vegetable consumption include increasing food literacy and the availability, as well as convenience of, fruits and vegetables; two aspects in which school gardens are exemplary. Please refer to our published paper of January 2021 in the International Journal of School Health.

**Do you have a school or personal garden on your property?
Would you like to start a garden club in your school, afterschool program, troop, or at home?**

Would you like to receive monthly online interactive newsletters with tips on gardening, educational lessons, games, and more?

The Joseph P Cory Foundation, a non-profit organization, provides their Gardens of Hope program at no cost, an impactful way to optimize health and wellbeing: Mind-Body-Spirit. Our on-site garden syllabus, is grade appropriate, and has been adopted by teachers and parents in Palm Beach County and beyond. At this time, the program has been designed for younger students, however the materials can be modified to support more mature audiences, skillsets, and themes.

We partner with The School District of Palm Beach County, Palm Beach County Parks and Recreation, and external collaborators for their Wellness Promotion Task Force. The University of Miami Miller School of Medicine's MD/MPH program is in its fourth year of alliance with the Joseph P Cory Foundation, to positively substantiate a knowledge, attitude and behavior exchange among students who participate in our program.

We hope you will join us and align with our mission: Empowering people and communities to achieve wellness and wellbeing through expertise, education, and guidance.

**In good health!
Nada Cory, Founder and President**



Take Our Survey

We recommend students complete the Pre-assessment Survey prior to beginning the Gardens of Hope syllabus. This is to be repeated (Post-assessment Survey) at the end of the year, when most of the lessons and hands-on gardening experience has been implemented. Simply click on the above link and fill in the answers; data will be sent directly to the foundation. This may also be printed and handwritten by students. Please make arrangements for the hard copies to be delivered to the Joseph P Cory Foundation.

Note: These assessment surveys *are not* a test, and will not be graded. There are no right or wrong answers. Please complete it to the best of your ability.

All answers are confidential, and the information obtained for the Joseph P Cory Foundation are for internal purposes only, so we may better serve our students and the community through our Gardens of Hope program.



LEARNING OBJECTIVES

NOTE: THIS IS A SAMPLE SYLLABUS LESSON

This lesson will enhance the mind, body, and spirit of students. Following this lesson, students will:

- **Mind:** Understand the life cycle of plants, and what plants need to grow.
- **Body:** Plant, water, and watch their seeds grow into mature plants.
- **Spirit:** Learn to take care of something, and feel responsible for nurturing a living subject.

Overview:

As part of this lesson, students will learn about the natural life cycle of a plant, and the components plants need to grow and be healthy.

Materials:

- Plant life cycle worksheet
- Seeds
- Soil
- Container for potting (Plastic yogurt container, applesauce container, pudding containers, egg cartons, milk cartons, etc.)
- Plant calendar

Steps:

1. Have students complete the pre-survey. Collect surveys to understand students' baseline knowledge.
2. Complete the Plant Life cycle worksheet, upon watching the plant life-cycle video.
3. Draw the various components plants need to be healthy.
4. Plant seeds in a container of choice, and water them appropriately.
5. Fill out the plant calendar, and have students predict what their seeds and plants will look like over time.



PLANT LIFE-CYCLE WORKSHEET

Please watch this [video](#) three times.

Fill in the following blanks after you watch the video.

1. Flowering plants start out as _____.
2. With water, _____, and _____, your plant will start to form.
3. Roots are important because they soak up _____ from the ground.
4. When leaves soak up sunlight and carbon dioxide to make food, it is called _____.
5. _____ is when pollen is moved from the stamen to the stigma to produce seeds.
6. Two ways seeds can spread are _____ and _____.
7. Non-flowering plants do not have seeds. Instead, they have _____.

Video



IN ORDER FOR PLANTS TO STAY HEALTHY, THEY NEED FIVE THINGS:



1. **Sunlight**
2. **Water**
3. **Air**
4. **Proper temperature. Most plants do best when the temperature is between 70 – 80 degrees Fahrenheit (F) during the day, and between 65 – 70 degrees at night.**
5. **Nutrients (found in soil)**

Draw a picture focusing on one item below, that plants need in order to grow: Sunlight, Water, Nutrients, Proper Temperature, Air. You can use a separate piece of paper if you like.



STARTING YOUR SEEDS INDOORS

1. Find a container to plant your seeds in. You can use a flowerpot or something else: Yogurt container, milk carton, egg carton, or a pudding cup!
2. Make 3-5 small holes on the bottom of your container if it does not already have some. This will allow excess water to drain out.
3. Fill most of your container with soil. Be careful, *you don't* want to fill it ALL the way up to the top.
4. Dig small holes to put your seeds in! You can use a shovel(if outside), a spoon, a pencil or even your fingers (just make sure to wash your hands after.)
5. Read your seed packet, and see how deep you should dig your hole, and how far apart they should be. If it doesn't say, try digging holes $\frac{1}{4}$ inch deep and 1 inch apart from other holes. The rule: Your hole should be three times the thickness of the seed.
6. Put a seed in each hole, and then cover the hole up with soil.
7. Water your plant, and put the pot in some sunlight.
8. Tend to your plant every day, and make sure it gets enough water and sunlight.
9. Watch your seeds grow into tall healthy plants!



HOW TO READ "SEED TALK"!

SEED PACKETS ANSWER YOUR QUESTIONS

How many seeds, how deep, and how far apart should I plant?

How soon will they sprout?

What will the seedling look like?

Should I "thin" the new sprouts?

How soon can I pick them?

Could I start these seeds early, indoors?

When is it OK to plant outdoors where I live? Ask your grown-up to point to where you live on the map. Then match the color to the right month.

Jack O'Lantern PUMPKIN

Plant these outdoors in the sun, **1½ inches deep**. Put **4 to 6 seeds** in a pie-size "family group," with **each group 8 feet apart**. (Pumpkins are creeping vines that need lots of space.) This packet will make **4 "family groups"**. Seedlings will appear in **8 or 10 days**.

Pumpkin seedlings look like this:

As soon as the plants are up, **pull out the extras** so there are only **3 or 4 plants to a group**. Pumpkins take about **14 weeks** to become Jack O'Lantern-size, ready to carve.

EARLY START: You can start the seeds indoors in little pots, 3 or 4 weeks early. When it's warm, carefully transplant them outdoors.

When to Plant Outdoors

June
May-June
Apr.-June
Apr.-June
Apr.-June

NORTHMAP SEEDS
KIDSEEDS
Northmap King Co., Mpls., MN 55440

Sprouting Seeds Daily Growth Chart

Seed Predictions

I planted _____ seeds.

I think my seeds will pop out of the soil on Day _____.

My seeds popped out of the soil on Day _____.

On Day 24, my plant will be _____ inches tall.

EVERY SEED GROWS AT ITS OWN SPEED.

Some grow fast and are ready to pick in no-time... like beans and radishes. Others need a long, lazy time in the sun before they're ready to pick. Pumpkins and peppers are a garden's slow-pokes.

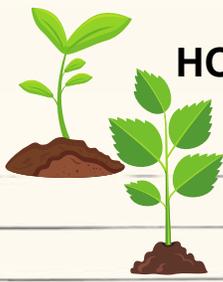
Certain vegetables, like lettuce, need to be grown in cool spring weather, while others, like tomatoes, will freeze their toes off if you put them out in the garden before the last frost of winter.



Day 1	Day 2	Day 3	Day 4	Day 5	Day 6
Day 7	Day 8	Day 9	Day 10	Day 11	Day 12
Day 13	Day 14	Day 15	Day 16	Day 17	Day 18
Day 19	Day 20	Day 21	Day 22	Day 23	Day 24



HOW ARE YOUR PLANTS GROWING?



5"

4"

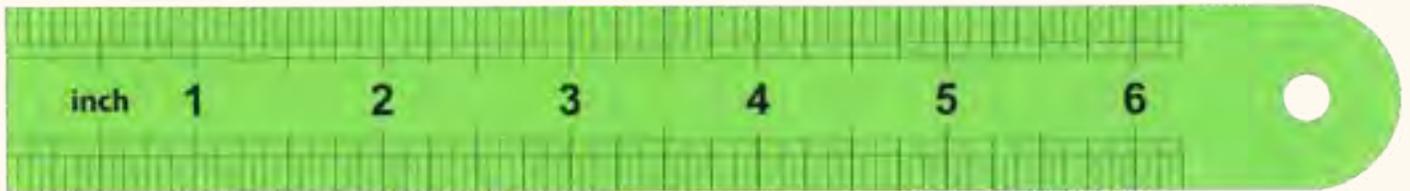
3"

2"

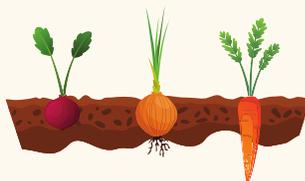
1"

Day 1 Day 2 Day 3 Day 4 Day 5 Day 6 Day 7 Day 8 Day 9 Day 10 Day 11 Day 12 Day 13 Day 14

Days Since Planting Chart



Cut out this ruler and use it to measure your plants as they grow.



PLEASE CONTACT US

Together we can impact student and community health, one seed at a time!



561.501.3538



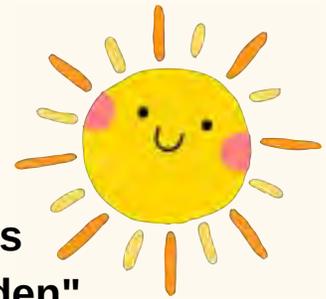
<https://www.facebook.com/JPCoryFoundation/>



<https://josephpcoryfoundation.org>



info@josephpcoryfoundation.org



**"Why try to explain miracles to kids
when you can have them plant a garden"**

Robert Brault



EIN# 47-5340787



GARDENS OF HOPE
JOSEPH P. CORY FOUNDATION