



# Grandparents' Garden

## Activity sheet

**Target group:** 6+ years old

**Duration:** 30 minutes, but can be adjusted based on pupils

**Necessary materials:**

- Number tokens
- Tokens with many objects (fairy tale characters, vegetables)
- Board for arranging numbers
- Tokens with mathematical symbols:  $<$ ,  $=$ ,  $>$
- Image with garden rows

**Key competence:** Calculation skills

### GENERAL OBJECTIVE

The goal of this activity sheet is to develop basic math skills through a familiar and engaging context: **Grandparents' Garden**. The activities are designed to support **active learning** and **learning through play**, using visual elements and real-life situations related to planting and caring for vegetables.

**Students will practice:**

- Counting and writing numbers from 0 to 30;
- Comparing numbers with visual support (vegetables, garden rows, quantities);

- Ordering numbers in ascending and descending order using a number line (in the “Grandparents’ Garden” context);
- Completing number sequences with missing elements;
- Comparing sets (numbers represented by groups of objects, such as radishes, carrots, onions, etc.).

## IMPLEMENTATION

### 1. General Instructions:

Present the children with the goal of the activity: to develop counting, comparing, and ordering skills through math games based on the familiar theme of the grandparents’ garden. Explain that they will “help the grandparents” organise the vegetable harvest while learning about numbers.

### 2. Getting familiar with the materials:

Show the children the AAC Tool worksheet and its images (radishes, onions, carrots, etc.). Name the vegetables together and talk about them: how many there are, what they look like, and which is their favourite. You can also use physical cards or figurines as concrete support.

### 3. Counting and Writing Exercises:

The children will count the vegetables in each group and write the corresponding number. This can also be done verbally, using fingers, tokens, or sticks for visual support.

### 4. Comparing and Ordering:

Ask the students to compare groups of vegetables: “Where are there

more?” “Where are there fewer?” Use symbols ( $<$ ,  $>$ ,  $=$ ) and encourage oral explanations. Later, children can order the numbers in ascending or descending order using the number line as a guide.

#### **5. Completing Sequences and Solving Problems:**

Help them complete missing number sequences and solve simple word problems, such as: “Grandma picked 3 radishes and then 2 more. How many does she have in total?” – encouraging drawing or using manipulatives to visualize the solution.

#### **6. Play-Based Consolidation Activity:**

Turn the activity into an interactive game: “plant the vegetables” in the correct order or “harvest” only groups with a specific number. Children can work in pairs or small groups to learn and practice through play.

### **POTENTIALS FOR AAC SKILLS DEVELOPMENT**

The numeracy activity "Grandparents' Garden" provides an excellent framework for developing communication skills in children who use augmentative and alternative communication (AAC) systems. The rich visual content (images of vegetables, number lines, and familiar elements) supports learning through associations between symbols, images, and words, enhancing both the understanding of mathematical concepts and language development.

By practicing concepts such as counting, comparing, and ordering, children have the opportunity to express quantities, make choices (“Where are more onions?”, “What comes after 5?”), answer questions, and initiate conversations

related to the activity. These interactions support the development of both receptive and expressive language in a functional and motivating way.

The exercises can also be adapted to include simple sentence structures (“I have 4 carrots.”, “Let’s add 2 more.”), encouraging the use of descriptive and sequential language. Applied games that simulate a garden allow for repetition of vocabulary in a meaningful context, promoting active learning and the reinforcement of conversational routines.

Being a predictable, clearly structured, and visually supported activity, it gives children a sense of security and allows them to actively participate, collaborate, ask questions, and provide answers, all of which are essential components for the development of functional communication skills and the effective use of AAC systems.

## TO GO FURTHER

### EXTENSION

To stimulate creativity and the application of knowledge, you can organise a workshop where students create their own math garden. They can draw or build garden beds using paper, cardboard, or modelling clay, adding cut-out or moulded vegetables.

Each student will choose the number of vegetables for each bed and write the corresponding numbers, then compare, order, or complete the "planting" rows. The activity becomes even more engaging if sensory materials are used, such as beans, lentils, or small figurines for the “harvest.”



## CREATE YOUR OWN VERSION

Draw your own garden and choose how many vegetables to plant in each row. Write the corresponding number and compare with a classmate: Who has more? Arrange the vegetables in ascending or descending order. You can use beans, bottle caps, playdough, or drawings to create your math garden!



# GIANT RADISH

## Examples of problems

- Help Grandpa: add 5 carrots on the first layer, 6 onions on the second layer, 7 cucumbers on the third layer.
- Grandpa planted vegetables in the garden, but not all of them sprouted. In one row he planted 15 radish seeds, but only 5 sprouted.  
Question: How many radishes did not sprout?
- The grandmother picked 10 onions. The granddaughter picked 6 more. Question: How many onions did they pick together?
- In one layer there are 3 radishes, in another there are twice as many.  
Questions: How many radishes are in the second layer?  
How many are there in total?