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**DEVELOPING COMPETENCIES OF
SPECIAL NEEDS CARE PROVIDERS ON
SCIENTIFIC EVIDENCE-BASED
PRACTICES WITH TECHNOLOGY-
SUPPORTED TOOLS COURSE BOOK**

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PREFACE

Evidence-based practices in the education of individuals with special needs refer to the systematic use of methods whose effectiveness has been proven through scientific research. Prioritising these practices in interactions with the target groups helps to standardise the intervention process, ensure maximum benefit from the implementation, and save time and effort.

Personnel and support staff providing care to children with special needs are the primary actors ensuring that interventions are implemented within the child's natural environment. In social service institutions, this role is fulfilled predominantly by care providers. There is a complex relationship between the knowledge and skills required for caregivers to assume this key role and their perceptions of self-efficacy — their belief in their own abilities. In other words, the success of evidence-based practices is directly proportional to the caregivers' capacity to execute interventions in full accordance with their established protocols.

It is observed that caregivers' levels of knowledge and skills may be insufficient for the full implementation of evidence-based practices due to various factors. These include an incomplete understanding of the underlying behavioural principles, the correct application of certain intervention components while omitting more complex or time-consuming parts, or difficulties in translating scientific terminology into practice. The emergence of such challenges weakens the effectiveness of the scientific method and, consequently, hinders the development of the child with special needs. While there is a global consensus on the necessity for caregiving staff to possess high levels of competence, it is clear that existing competencies must be enhanced not merely through "self-directed learning," but via professional development models that are systematic, technology-supported, and incorporate performance feedback. Traditional in-service training often falls short in transforming knowledge into practical skills, as it typically offers limited opportunities for immediate feedback or performance monitoring.

This book, whose rationale is outlined above, has been prepared within the scope of the Erasmus+ project titled "Developing Competencies of Special Needs Care Providers on Scientific Evidence-Based Practices with Technology-Supported Tools." Adopting a reader-friendly approach, it aims to enhance the professional capacities of caregivers through the following sub-modules:

- (i) Behaviour Management
- (ii) Language and Communication Skills
- (iii) Activity-Based Intervention
- (iv) Activity Schedules
- (v) Peer-Mediated Intervention
- (vi) Self-Determination
- (vii) Early Literacy

The modules and contents within this book have been developed based on a holistic perspective incorporating the views and suggestions of practitioners and academics in Türkiye, Germany, and the Czech Republic, as well as the recommendations derived from a comprehensive needs analysis report based on current literature. The primary objective of this work is to increase the competencies of care providers serving children with special needs regarding evidence-based practices in special education. We hope that this book will serve as a guide for caregivers and professionals in the field of special education on their journey to transforming theoretical knowledge into high-quality practical application. As the project team, we believe that the engagement of our esteemed readers with this work and the sharing of suggestions for further development will be the most significant indicator that this book has fulfilled its purpose.

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Behavior Management



CONTENTS

- Introduction
- Understanding Challenging Behavior
- Preventing Challenging Behaviors
- Teaching Replacement Behaviors
- Summary
- Problems and Answer Key



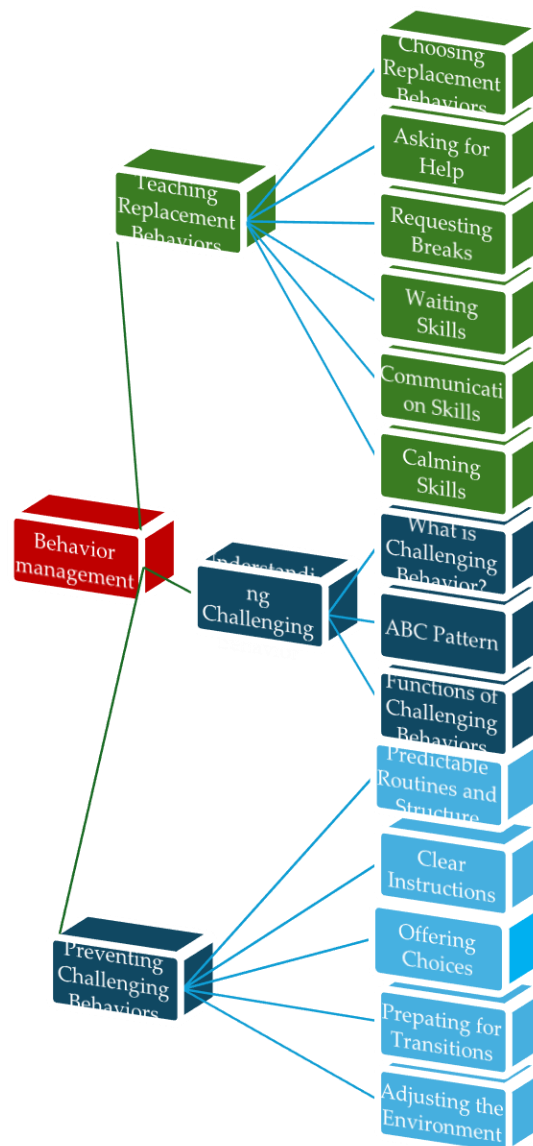
LEARNING OUTCOMES

- After studying this unit, you will be able to:
 - Identify the reasons behind your child's challenging behaviors
 - Explain the four main functions of challenging behavior
 - Apply prevention strategies to reduce behavior problems
 - Teach positive replacement behaviors
 - Use praise and reinforcement to strengthen positive behaviors



THE SPECIAL EDUCATION COURSE BOOK FOR CAREGIVERS Yusuf Akemoğlu, PhD

UNIT NO: 1



1 BEHAVIOR MANAGEMENT

1.1 INTRODUCTION

Many children including both typically developing and those with special education needs (SEN) exhibit undesired behaviors such as hitting, kicking, crying, screaming and tantruming. In general, we call these behaviors “challenging behaviors” because they become challenging to the child as well as to their caregivers. They are challenging to the child’s learning, development, socialization, and adaptation to the community. Similarly, they are challenging the caregivers because they hinder their ability to provide care as well as support their development.

Children use challenging behaviors to communicate their needs, wants and desires. Although not always easy, once we understand why the child is engaging in challenging behavior, we then can begin to identify the possible ways of addressing them and also teaching them more appropriate behavior. Thus, these challenges require approaches that are natural and developmentally appropriate and therefore this course book is designed to cover all necessary foundational knowledge and provide caregivers with practical information they need for behavior management.

Throughout the unit, real-life home examples, practical tips, and reflection activities will help parents apply strategies during everyday routines such as mealtime, playtime, bedtime, and outings. By the end of this unit, parents will feel more confident, competent, and prepared to support their child’s behavior while building a stronger and more positive parent-child relationship.

1.2 UNDERSTANDING CHALLENGING BEHAVIOR



Understanding why children show challenging behavior is the foundation of positive and effective behavior management (Akemoglu & Hinton, 2025). Every behavior has a reason behind it. Children do not act out randomly or simply to be difficult. Instead, behavior is shaped by what children experience in their environment and by how adults respond to their actions. When parents understand the reasons behind behavior, they are better able to respond calmly, consistently, and in ways that truly support their child's development (Barton et al., 2025).

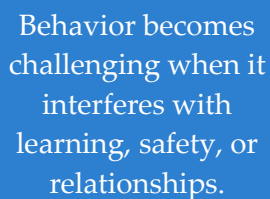
Many parents naturally focus on stopping challenging behavior as quickly as possible (Brookman-Frazee et al., 2006). While this is understandable, reacting only to the behavior itself often leads to short-term solutions. For example, giving a child a toy to stop a tantrum may work in the moment but can increase tantrums in the future. Positive behavior management encourages parents to look deeper and ask important questions such as: What happened before the behavior? What did my child gain or avoid after the behavior? What skill might my child be missing?

Children with special needs often experience difficulty with communication, emotional regulation, flexibility, and sensory processing. Children go through multiple daily routines and these routines can be demanding. Children are expected to wait, listen, walk, talk, regulate their emotions and follow directions and rules. These expectations can be overwhelming at times and due to their ages and developmental levels, children may not know how to express their frustrations, needs and their own expectations (Fettig et al., 2014). Thus, the challenging behaviors occur so that they can get their needs met. However, children feel safer and become more open to learn appropriate communication acts, when their caregivers understand the reason behind the challenging behavior, provide a comforting and

support space, and teach them how to express their needs. By doing so, the parental and child stress can be reduced significantly (Hayes & Watson, 2013). This section helps parents begin that process by clearly explaining what challenging behavior is and why it occurs.

1.2.1 What Is Challenging Behavior?

Challenging behavior refers to any action that interferes with a child's learning, safety, relationships, or daily routines (Fettig et al., 2014). These behaviors can be mild, such as whining or refusing instructions, or more intense, such as aggression or long-lasting tantrums. What makes a behavior "challenging" is not simply the action itself, but how often it occurs, how strong it is, and how much it affects the child's ability to participate in daily life (Hart & Whalon, 2013).



Behavior becomes challenging when it interferes with learning, safety, or relationships.

For young children, some emotional outbursts are a normal part of development. However, when behaviors happen frequently, last a long time, or prevent children from learning and socializing, they require additional support (Wood et al., 2010). Children with special needs may show challenging behavior more often because they struggle with skills that other children develop more easily, such as using words to express feelings, coping with frustration, or adjusting to changes (Dunlap et al., 2001). Common challenging behaviors seen in young children include crying or screaming for extended periods, throwing objects, hitting, or biting others, refusing to follow routines, running away during activities, and dropping to the floor during transitions. These behaviors can be exhausting for parents and may lead to feelings of helplessness or frustration.

Children are not born with "bad" habits or characteristics. Therefore, these labels are harmful and shift the focus from understanding the function of the behavior to putting the blame on the child. Instead of using these labels, we need to focus on understanding the function of the behavior and define and describe their

behaviors in observable manners. Below you can see examples and non-examples of defined behaviors (Rahn et al., 2017).

Examples:

- ✓ Put one's head down for 20 minutes
- ✓ Hits peers with his hands
- ✓ Takes items that belong to others
- ✓ Throws tantrums at least four times during independent work

Non-Examples:

- ✓ Hyperactive
- ✓ Aggressive
- ✓ Angry
- ✓ Frustrated

You can observe and measure how long the child put their head down, how many times the child hit his peer, what items the child took from others, and what four tantrums looked like. However, defining a child as hyperactive, aggressive, angry, or frustrated are not observable and measurable examples. These are feelings or emotions. We need to know what they look like in observable terms. To define these feelings or emotions in observable terms, one can say, "he is out of seat 5 times within 10 minutes" for a hyperactive child or "she hits her head for a child who is frustrated."

1.2.2 The Abc Pattern: Before – Behavior – After

We can identify the function of a behavior by observing it during daily occurrences (Fettig & Barton, 2014). While observing the behavior during a routine in which occurs, we identify and note what happens right before the behavior (antecedent), what the behavior looks like (behavior), and what happens right after the behavior (consequence). We call that the ABC analysis. This analysis helps us recognize what triggers the behavior, what causes it (antecedent), what it is (behavior) and what maintains, what makes it occur over and over (consequence). Observing the ABC

pattern allows parents to respond more thoughtfully rather than emotionally. Instead of reacting only to the behavior, parents can change what happens before the behavior occurs or adjust what happens after it. This approach reduces conflict and promotes learning (Dunlap et al., 2013).

Antecedent. Antecedents are likely to trigger the child's challenging behavior. These are "events" that happen Immediately Before the challenging behavior occurs. An antecedent can be:

- a direction or a hard task given to the child
- an unpreferred activity
- demanding too many things from the child such as (sit here and wait for 5 minutes)
- unstructured time during routines and activities
- unexpected change in the child's daily routines or activities, and
- over stimulation on sights, sounds, tastes, smells, or even physical touches.

Behavior. The behavior is the target challenging behavior such as hitting, biting, kicking, screaming. Behavior must be described in observable terms. The consequence is what happens right after the behavior. This may involve adult attention, removal of a task, return of a toy, comfort, or a change in the environment.

Consequence. Consequence is what happens after the behavior. It is the thing that happens Immediately After a behavior that makes the behavior more likely to happen again. When thinking about consequence, we need to look for patterns of events or behaviors that followed the challenging behavior. Consequences can increase the likelihood of a behavior happening again, decrease the likelihood of a behavior happening again, or have no effect on the occurrence of a behavior in the future. Here are some examples:

When Rachel hits her peers, they leave her alone, so she doesn't repeat this behavior. Leaving Rachel alone occurs immediately after she hits her peers and therefore it is the consequence of

her challenging behavior. Rachel learns that if she hits her peers, she will stay alone, so her hitting behavior decreases.

When Mitch runs away from the room after grandpa tells him to help with a chore, his grandpa doesn't say anything. Mitch runs away and as a consequence grandpa doesn't say anything. Mitch's behavior is now reinforced, and he learns that he can run away to not do chores.

Table 1

ABC Examples from Daily Life

Antecedent (Before)	Behavior	Consequence (After)	What the Child Learns
Parent says "Turn off TV"	Child screams	TV stays on	Screaming keeps TV time
Asked to clean toys	Child cries	Parent cleans	Crying avoids task
Parent talks on phone	Child hits arm	Parent stops call	Hitting brings attention
Loud supermarket	Child drops to floor	Leaves store	Crying escapes noise

How to Practice ABC at Home. As a caregiver, you do not need to write long notes. A few short observations each day are enough.

1. Choose one behavior to focus on for three to five days.
2. Write what happened before, during, and after the behavior.
3. Look for patterns and common triggers.
4. Ask: What does my child gain or avoid?

Over time, you will begin to predict difficult moments and prepare strategies in advance.

1.2.3 The Four Main Reasons Children Use Challenging Behavior

Although children's behaviors may look very different on the surface, most challenging behaviors happen for a small number of common reasons (Barton et al., 2025). Understanding these reasons, also called the function of behavior, helps parents choose strategies that truly meet their child's needs. When parents respond in ways that match the function, behavior changes more quickly and with less stress.

The four most common reasons children use challenging behavior are: gaining attention, escaping or avoiding tasks, accessing something they want, and meeting sensory or comfort needs. A single behavior can sometimes serve more than one purpose, and the same behavior may have different functions in different situations. This is why observing patterns using the ABC method is so important (Rahn et al., 2017).

1.2.3.1 Attention

Many children use challenging behavior to gain interaction from adults. Attention

can be positive, such as talking, hugging, or helping, or negative, such as scolding, arguing, or rushing over. For a child who wants connection, any form of attention may be rewarding.

Common home examples include:

- Screaming when a parent is talking on the phone
- Hitting a sibling when adults are busy
- Throwing toys to get a reaction

In these situations, the child learns that challenging behavior quickly

brings adult focus. Even when the attention is corrective ("Stop that!"), it still teaches the child that the behavior works.

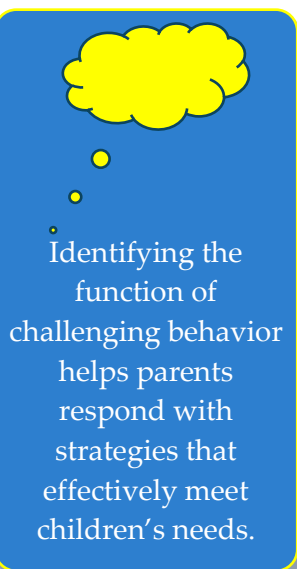




Figure 1. *Examples for attention*

1.2.3.2 Escape or Avoidance

Some children use challenging behavior to avoid tasks or situations that feel difficult, boring, confusing, or overwhelming. This is very common for children with language delays, learning challenges, or sensory sensitivities.

Common home examples include:

- Crying when homework begins
- Running away during bath time
- Refusing to clean up toys
- Dropping to the floor during transitions

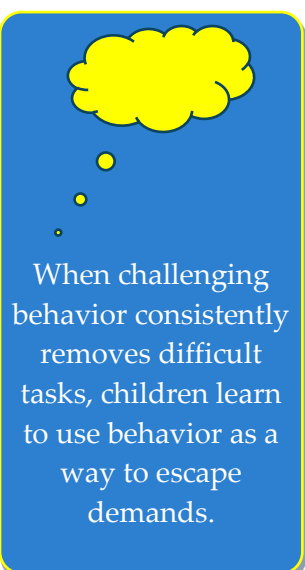
When the task is delayed, simplified, or removed after the behavior, the child learns that challenging behavior is an effective way to escape.

1.2.3.3 Access to Something Desired

Children may use challenging behavior to obtain toys, food, screen time, or preferred activities. Young children often struggle with waiting, sharing, and delayed gratification, which makes this function very common.

Common home examples include:

- Tantrums in the store for candy
- Screaming when the tablet is turned off
- Grabbing toys from siblings



If parents give the desired item to stop the behavior, the child learns that the behavior works.

1.2.3.4 Sensory Needs

Some challenging behaviors are related to how a child experiences sensory input such as noise, light, movement, textures, or physical sensations. Children may try to escape uncomfortable sensations or seek sensory experiences that help them feel calm.

Common home examples include:

- Covering ears in loud places
- Crying when clothing feels itchy
- Rocking, spinning, or jumping repeatedly
- Biting sleeves or chewing objects

These behaviors often help the child regulate their body or reduce discomfort.

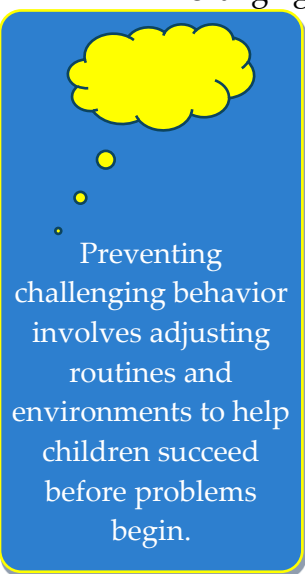
1.3 PREVENTING CHALLENGING BEHAVIORS

Once parents understand why challenging behavior occurs, the next important step is learning how to prevent many behavior problems before they begin. Prevention focuses on changing daily routines, environments, and interactions so that children feel more successful,

calm, and understood. When situations are predictable, instructions are clear, and children have appropriate support, challenging behaviors decrease naturally (Dunlap et al., 2013).

Many behavior problems are not caused by children being unwilling to cooperate, but by situations that feel confusing, overwhelming, too demanding, or unpredictable. Simple adjustments, such as preparing children for transitions, breaking tasks into smaller steps, offering choices, and organizing the environment can significantly reduce frustration and emotional outbursts.

Prevention strategies help parents guide behavior in positive ways without constant correction or conflict (Brookman-Frazee et al., 2006).



Preventing challenging behavior does not mean removing expectations. It means setting them up for success in routines and everyday activities. We think ahead to what might trigger frustration like unclear instructions, tasks, or sensory overload and make small changes before behavior occurs. These proactive strategies build independence, confidence, and self-regulation. In this section, you will learn about practical strategies to prevent challenging behavior and promote positive behavior (Akemoglu & Hinton, 2025).

1.3.1 Creating Predictable Routines And Structure

Children feel secure and safe when they could predict the next activity or routine. Knowing what comes next helps them to understand the expectations associated with the routine or activity. Once feeling calm, secure and safe, children could have a sense of empowerment and control and begin to demonstrate appropriate and desired behaviors (Fettig et al., 2014). To help children predict the routines, caregivers could:

- Establish a consistent routine pattern
- Use the same order for routines
- Give transition warnings, and
- Use simple visuals that depict the routine/activity



Figure 2. *Examples for creation routine*

1.3.2 Using Clear And Simple Instructions

Many challenging behaviors happen because children do not fully understand what adults are asking. Long explanations, multiple steps, or unclear language can confuse

young children and lead to frustration.

Effective instructions should be:

- Short
- Specific
- Given one step at a time

Examples:

Instead of: "Can you please clean your toys and then come to the table and wash your hands?"

Say: "Put toys in the box." (pause) "Come wash hands."

It is also helpful to tell children what to do rather than what not to do.

Instead of: "Don't run."

Say: "Walk slowly."

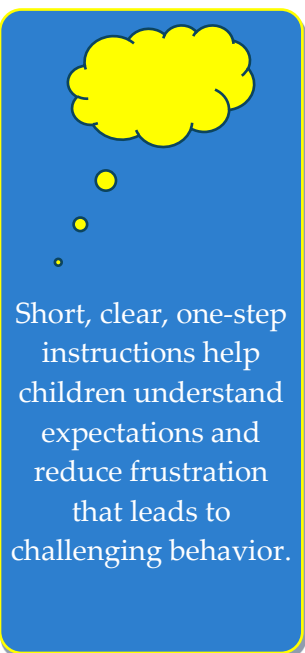
Clear instructions increase success and reduce power struggles.

1.3.3 Offering Choices to Reduce Resistance

Choices give children a sense of control while still allowing parents to guide behavior. When children feel they have some control, they are more likely to cooperate.

Helpful choices include:

- "Do you want the red cup or the blue cup?"
- "Do you want to brush teeth first or put pajamas on first?"
- "Do you want to clean up blocks or cars first?"



Choices should always be limited and appropriate. Too many options may overwhelm children.

Table 2

Using Choices to Promote Cooperation

Daily Situation	Less Effective Approach	Choice-Based Approach	Why It Helps
Getting dressed	"Put your clothes on now."	"Do you want the blue shirt or the red shirt?"	Child feels control while still following routine
Brushing teeth	"Go brush your teeth."	"Do you want to brush first or wash hands first?"	Reduces resistance and power struggles
Cleaning toys	"Clean everything up."	"Do you want to clean blocks or cars first?"	Makes task feel manageable
Mealtime	"Sit and eat."	"Do you want the small spoon or big spoon?"	Encourages cooperation

1.3.4 Preparing for Transitions and Changes

Transitions, such as stopping play, leaving the house, starting homework, or going to bed are common triggers for challenging behavior. Children do better and have smoother transitions when they are told what comes next.

Parents can make transitions smoother by:

- Providing ahead of time warnings ("two more minutes for play")
- Using classroom leaders to provide warnings to their peers
- Using digital, visual or sand timers
- Allowing children to make a choice for transition
- Using "first/then" ("First eat, then play")

Example:

"Five more minutes to play. Then we put toys away and have juice."

Preparing children in advance helps reduce emotional reactions.

1.3.5 Adjusting the Environment to Reduce Triggers

Sometimes behavior improves simply by changing the environment. Noise, clutter, distractions, or difficult task settings can overwhelm children.

Helpful environmental changes include:

- Reducing noise during learning tasks
- Keeping preferred toys out of sight during homework
- Creating a calm corner for breaks
- Organizing materials clearly

Small environmental changes can make big behavior improvements.



1.3.6 Supporting Sensory and Emotional Regulation

Some children become overwhelmed by sensory input or strong emotions.

Supporting regulation helps prevent meltdowns. Helpful strategies include:

- Movement breaks (jumping, stretching, carrying objects)
- Calm breathing exercises
- Soft music or quiet time
- Comfortable clothing
- Fidget toys or sensory tools

1.4 TEACHING REPLACEMENT BEHAVIORS

Preventing challenging behavior reduces many difficulties, but long-term change happens when children learn new skills (Fox & Hemmeter, 2014). Replacement behaviors are positive actions that serve the same purpose as challenging behavior

but in a more appropriate and effective way. Instead of stopping behavior without guidance, parents help children learn what to do instead.

For example, if a child cries to avoid a task, a helpful replacement behavior may be asking for a break. If a child hits to get attention, a replacement behavior may be tapping a parent's arm or calling their name. When replacement behaviors meet the same need more effectively, challenging behavior naturally decreases.

Teaching replacement behaviors requires consistent modeling, immediate support, and frequent encouragement (Akemoglu & Hinton, 2025). Children do not automatically know how to use new skills, especially during emotional moments. Parents play a key role in guiding, practicing, and reinforcing these behaviors until they become natural habits. This section introduces common replacement behaviors that are especially helpful for young children with special needs (Dunlap et al., 2013).

Table 3.

Examples of Challenging Behaviors and Replacement Behaviors

Challenging Behavior	Likely Reason (Function)	Replacement Behavior
Crying when a task begins	Escape from difficult task	Asking for a break or help
Hitting to get attention	Gaining adult attention	Tapping parent's arm or calling name
Screaming for a toy	Access to desired item	Asking using words or pictures
Throwing toys during play	Frustration or control	Asking for turn or help
Dropping to floor during transitions	Avoiding change	Using countdown and calm words
Grabbing from siblings	Wanting immediate access	Waiting and requesting politely

1.4.1 Choosing Effective Replacement Behaviors

A replacement behavior should meet three important conditions:

1. It serves the same purpose as the challenging behavior
2. It is easier for the child to use than the challenging behavior
3. It is socially appropriate

For example, if screaming helps a child gain attention, teaching the child to say “Mom” or touch the parent’s arm can replace screaming. If throwing toys ends a difficult task, teaching “break please” becomes a better option.

Replacement behaviors should always be taught before problems happen whenever possible. Practicing during calm moments prepares children to use the skill during stressful situations.

1.4.2 Teaching Children to Ask for Help

Many challenging behaviors occur because children feel confused, frustrated, or overwhelmed. Teaching children to ask for help gives them a positive way to communicate difficulty. Steps for teaching “help”:

1. Choose a simple word, sign, or picture (“help”)
2. Model the word, sign, or picture (“help”)
3. Create simple opportunities for the child to practice using “help”
4. Aid and/or correct the child gently when needed
5. Reinforce the child’s effort and “help” communicate act.

To illustrate, imagine a child who is trying to zip a jacket but struggles and then cries. The parent calmly says, “Say, ‘help’” and the child says, “help.” The parent helps immediately and praises the child by saying, “Good job asking for help!”

1.4.3 Teaching Children to Request Breaks

If a task, direction or instruction is hard or over the child's developmental skill level, the child could feel overwhelmed. Therefore, we need to teach children to request breaks.

Here is how we can teach them to request "break":

1. Determine how you want them to ask for "break"
2. Create a visual card and pair it with verbal request
3. Model how to request "break" both verbally, nonverbally and visually
4. Provide practice opportunities
5. Aid and correct gently when needed
6. Provide "break" as a reinforcement

For example, think a child who begins whining while working on his homework. The parent notices that the child is whining and before things get worse, the parent says, "break please" and prompts the child to use the "I need a break" card. The child hands over the card and takes a break.

1.4.4 Teaching Waiting Skills

Waiting is challenging for children and therefore could lead to crying, screaming, hitting and so on. Teaching waiting builds self-control.

Simple waiting practice:

- Start with 3-5 seconds
- Use visual timer or fingers
- Praise successful waiting
- Gradually increase time



Example:

The child asks for juice. The parent says, “Wait five seconds,” counts slowly, then gives juice and praises waiting. Gradually, waiting time increases to 10 seconds, 30 seconds, then one minute.

1.4.5 Teaching Communication Skills

Limited communication is one of the strongest causes of challenging behavior. When children cannot express needs, frustration builds quickly. Parents can support communication by:

- Modeling simple words
- Using gestures or signs
- Providing picture cards
- Encouraging attempts

Example: Before a tantrum for a toy, the parent prompts “say toy.” The child attempts the word and receives the toy with praise. Every successful communication attempt should be rewarded.

1.4.6 Teaching Calming and Self-Regulation Skills

Young children do not automatically know how to calm themselves when they feel upset or overwhelmed. Emotional regulation is a skill that must be taught and

practiced over time. Children with special needs often have greater difficulty managing strong emotions, which can lead to crying, tantrums, or aggressive behavior.

Parents can support regulation by teaching simple calming strategies. Deep breathing games, such as pretending to smell a flower and blow out a candle, help children slow their breathing and relax their bodies. Quiet corners or calm spaces provide a safe area with soft pillows, toys, or books where children can go to feel calmer. Soft objects to squeeze, such as stress balls or stuffed animals, release physical tension. Movement

breaks, including jumping, stretching, or short physical activities, help children reduce restlessness and regain focus.



Children learn to calm themselves over time when adults teach and practice calming strategies consistently.

1.5 SUMMARY

This unit explained how parents can understand and guide children's challenging behavior using positive, practical strategies. Children's behavior is a powerful form of communication, especially for young children with special needs such as autism, developmental delays, language difficulties, or sensory sensitivities. Behaviors such as crying, refusing tasks, tantrums, aggression, or running away are not signs that children are "bad." Instead, they often show that a child is overwhelmed, confused, seeking attention, trying to avoid difficulty, or needing support to regulate their body and emotions. The unit first focused on understanding challenging behavior. Challenging behavior is defined by its impact on a child's learning, safety, relationships, and daily routines. Parents are encouraged to describe behaviors clearly and objectively (what happened, how long it lasted, and what the child did) rather than using labels such as "spoiled" or "stubborn." This helps families identify patterns and choose effective solutions.

Next, parents learned the ABC Pattern (Antecedent–Behavior–Consequence). The antecedent is what happens before the behavior, the behavior is the child's action, and the consequence is what happens right after. By observing ABC patterns, parents can identify triggers and understand what may be maintaining the behavior. Children are likely to repeat behaviors that help them obtain something they want or avoid something they dislike, especially when outcomes happen quickly. The unit also introduced the four main functions of challenging behavior: attention, escape or avoidance, access to desired items or activities, and sensory needs. Understanding the function helps parents respond with strategies that match the child's needs.

Prevention strategies were then explained as a keyway to reduce behavior problems before they begin. Routines that are predictable allows children to know what comes next and this helps children feel calm and safe. Moreover, knowing the routine means knowing the expectations and therefore using the skills and behaviors that are expected. Caregivers could use simple strategies to help their children have smoother and predictable

transitions between routines. They could give their children warnings, show the visual of their schedule and use “first-then” statements.

Lastly, in this coursebook, we learned that caregivers could use various communication strategies that could eliminate the child’s challenging behaviors. These strategies include teaching the child to ask for help, request breaks, say, ‘no’, and use their own words or visuals cards to express their needs and wants. Children learn these strategies but continued modeling, abundance of practice opportunities and feedback for corrected and praise for using the learned skills and behaviors.

1.6 PROBLEMS

1. Challenging behavior is best understood as:
 - a) A sign of poor parenting
 - b) A child's intentional misbehavior
 - c) A way children communicate unmet needs
 - d) A personality problem
 - e) A lack of discipline
2. Which factor makes a behavior "challenging"?
 - a) Its impact on learning and daily routines
 - b) How loud the behavior is
 - c) Whether adults dislike it
 - d) The child's age
 - e) How quickly it stops
3. In the ABC pattern, the antecedent refers to:
 - a) The child's emotions
 - b) What happens before the behavior
 - c) The adult's response
 - d) The result of the behavior
 - e) The child's intention
4. A child screams and gets the tablet back. This behavior is maintained by:
 - a) Sensory needs
 - b) Escape
 - c) Attention
 - d) Access to desired item
 - e) Fatigue

5. Which behavior function is most likely when a child cries to avoid homework?
 - a) Attention
 - b) Escape or avoidance
 - c) Sensory regulation
 - d) Access to toys
 - e) Social interaction
6. Which strategy best helps prevent challenging behavior before it starts?
 - a) Punishing negative behavior quickly
 - b) Ignoring difficult situations
 - c) Creating predictable routines
 - d) Giving longer instructions
 - e) Removing all demands
7. Offering choices helps children because it:
 - a) Removes adult authority
 - b) Eliminates rules
 - c) Confuses expectations
 - d) Gives children control within limits
 - e) Reduces learning
8. A replacement behavior should:
 - a) Serve the same purpose as the challenging behavior
 - b) Be harder than the challenging behavior
 - c) Occur only after punishment
 - d) Be used only by adults
 - e) Stop all emotions
9. Teaching a child to say “help” instead of crying primarily supports:
 - a) Sensory regulation

- b) Communication skills
 - c) Physical coordination
 - d) Memory development
 - e) Discipline
10. Practicing calming strategies during calm moments is important because:
- a) Children only learn when upset
 - b) It makes meltdowns longer
 - c) Skills develop gradually through repetition
 - d) It replaces discipline
 - e) It removes emotions

Answer Key

1.c, 2.a, 3.b, 4.d, 5.b, 6c., 7.d, 8.a, 9.b, 10.c

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Supporting

Communication, Speech, & Language (CSL) Skills



THE SPECIAL EDUCATION COURSE BOOK FOR CAREGIVERS

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Ph.D.



CONTENTS

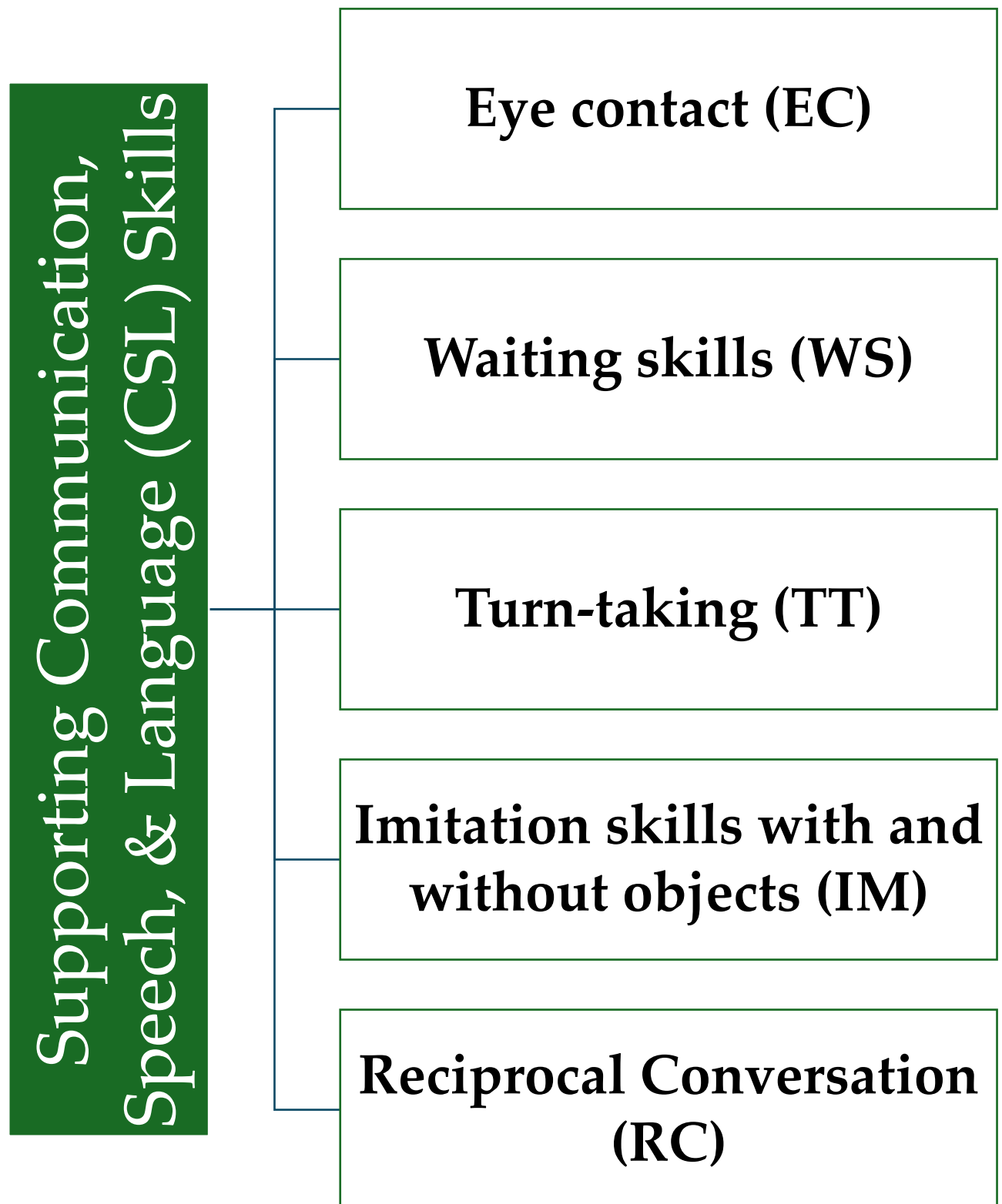
- Introduction
- Description of Service Delivery Models for Supporting CSL Skills
- Caregiver-Implemented Communication Interventions for Supporting CSL Skills
- Supporting CSL Skills: From an Applied Behavior Analysis Perspective



LEARNING OUTCOMES

- After studying this unit;
 - Describe the Service Delivery Models for Supporting CSL Skills
 - Explain the Caregiver-Implemented Communication Interventions for Supporting CSL Skills
 - Identify the Supporting CSL Skills: From an Applied Behavior Analysis Perspective

UNIT NO: 2



2 SUPPORTING COMMUNICATION, SPEECH, & LANGUAGE (CSL) SKILLS

2.1 INTRODUCTION

Communication and language skills are among the most prominent foundational skills in developmental areas for both typically developing children and those with special needs. Receptive and expressive language skills encompass more than just speaking and listening. Those skills are the key to social participation and belonging, and are also essential for emotional well-being, self-confidence, independence, academic achievement, career planning, and numerous critical life stages (Morreale et al., 2017).



Communication and language skills are among the most important foundational skills in development for all children.

Children with disabilities may struggle to acquire language skills at the same pace and rate without additional support from parents, specialists, caregivers, or even peers (Harlaar et al., 2008), whereas typically developing peers naturally learn these skills through interaction with their immediate environment, such as family members, teachers, or peers (Rakap et al., 2025). Early childhood is the most critical stage for the development of communication and language skills. Ecological support from the immediate environment, particularly from parents and peers, plays a crucial role in developing these skills. Due to disadvantages such as developmental disabilities, in addition to the presence of children with disabilities in orphanages, caregivers must assume primary responsibility for supporting the development of communication and language skills.

Several studies in international literature have demonstrated that caregiver-implemented interventions have been used to support early communication in young children with special needs, including those with language impairment (Finestack et al., 2022). However, in the national foundation, there is no study on the role of caregivers/care providers in supporting the communication and language

skills of children with special needs. In Türkiye, only special education teacher training programs have qualified content to teach communication and language skills. Despite some research conducted in Türkiye showing that special education teachers use a range of strategies to teach communication and language skills to children with special needs (Diken, 2014; Yazici & McKenzie, 2020), there is a lack of studies on supporting caregivers who work with children with special educational needs (SEN) in this area.

2.2 DESCRIPTION OF SERVICE DELIVERY MODELS FOR SUPPORTING CSL SKILLS



Service delivery models provide a framework for students receiving services such as communication, speech and language support, individual or social skills, or self-determination skills. In this context, educational services supporting communication, speech, and language skills should be offered individually, in small groups in a speech therapy room, or in an environment or a setting outside the classroom, as well as to the whole group in a classroom setting (Whitmire, 2026).

Home- and Community-Based Services (HCBS) are a form of person-centered care that includes a variety of health and human services delivered in home and community settings. Caregivers/providers working with children with SEN (including children with parental loss and disabilities) can provide Communication, Speech, and Language (CSL) services in community-based home or community settings. Table 4 depicts the community-based CSL services in the home or community setting for supporting functional communication of children with SEN (see Table 4).

Table 4.

Service Delivery Model to Support CSL Skills for Speech-Language Pathologists (SLP) or Other Service Providers (e.g., SEN Teachers, Care Givers/ Providers, Pedagogy Specialist)

Type	Direct and/or indirect services
	Usually individual if in a work or community setting (Also may be offered individually, in small groups or as a whole group)
Location	Off school site; often at job site or other community location (including orphan units for children with parental loss)
Frequency	Determined by Individualized Education Plan (IEP) Team; usually 1-2 times per month based on individual needs
Length of Session	Variable as situation demands; usually in the range from 30 minutes per session to 60 minutes per session as noted in IEP
Benefit	Maximizes functional communication skills in natural environments; meets the spirit of Least Restrictive Environment (LRE)
Caution	Heightened need to clarify roles of SLPs or other professionals/paraprofessionals and responsibilities relative to the student's IEP
Expectation	Better communication skills in home, work, and community settings

Source: Whitmire, K. A. (2026). Description of Service Delivery Models. Retrieved from www.medbridgeeducation.com

2.3 SUBTITLE CAREGIVER-IMPLEMENTED COMMUNICATION INTERVENTIONS FOR SUPPORTING CSL SKILLS

Orphaned children with special educational (SEN) needs are doubly disadvantaged demographically due to both their disabilities and the loss of their parents. These disadvantages negatively impact their communication skills due to their weak cognitive capacity and poor receptive language skills, while the insufficient verbal

input, they receive from their immediate environment creates additional obstacles to their communication abilities. Therefore, caregivers play a critical role in supporting communication skills, given that they are considered the only option for interactive communication with children with special educational needs and those who have experienced parental loss. Given that early support or intervention is crucial for facilitating and strengthening communication skills at an early age, caregivers/care providers can positively impact and promote communication outcomes for young children with special educational needs and parental loss.

A yellow thought bubble with three small yellow dots leading down to the text.

Young children with special educational needs require evidence-based early intervention.

Caregiver-implemented interventions are frequently used to support early communication skills in young children with special educational needs (SEN), particularly those with language disorders. In caregiver-implemented communication interventions (intervention components such as strategies taught, delivery method and format, and dosage/intensity), caregiver and child outcomes should be measured, respectively, and the type, quality, and level of evidence should be stated (Finestack et al., 2022). With that premise, a coursebook has been developed to facilitate and strengthen communication skills for young children with SEN.

Young children with special educational needs (SEN), particularly those experiencing communication delays and disorders, require evidence-based early intervention. Consequently, caregivers/care providers, or parents, should be trained in intervention strategies to enhance children with SEN's daily communication and language skills (Heidlage et al., 2020). Caregiver-implemented communication interventions are empirically supported strategies that encompass a wide range of skills critical to child development.

Communication can be language-based or linguistic, such as using conventional signs, words, and syntax, as well as social communication or non-linguistic, such as using gestures, vocalizations, eye contact, and turn-taking in both

receptive and expressive domains (Finestack et al., 2022). Considering that a child, whether or not they have special educational needs, spends most of their early childhood with a parent or caregiver rather than specialists, it is easy to understand

how crucial "**caregiver-implemented communication interventions**" are for children at a critical stage in the development of their communication skills. Moreover, caregiver-implemented communication interventions to support communication skills help individuals cope with generalization issues arising from teaching these skills in structured settings (e.g., classroom or practice room) and resolve related difficulties encountered when transferring these skills to individuals' natural and immediate environments.



Caregiver-implemented interventions yield positive results in developing social communication and language skills, particularly expressive language.

For children with special educational needs, particularly those with communication disorders or at similar risks, numerous studies have shown that caregiver-implemented interventions have positive outcomes in improving social communication and language skills, especially expressive language in early childhood (Finestack et al., 2022; Heidlage et al., 2020; Roberts et al., 2019).

2.4 SUPPORTING COMMUNICATION AND LANGUAGE SKILLS: FROM AN APPLIED BEHAVIOR ANALYSIS PERSPECTIVE

When children (and adults) acquire functional communication skills, their own lives—and the lives of their families and teachers—are greatly enriched (Bondy & Frost, 2001).

Table 5.

Critical Functional Communication Skills

Critical Communication Skills USED by the Person	Critical Communication Skills UNDERSTOOD by the Person
Request reinforcer (desired outcomes or activities)	Follow instructions
Ask for help	Follow a schedule
Ask for break	Wait
Respond "No" to "Do you want ...?"	Transitions
Respond "Yes" to "Do you want ...?"	Answer questions

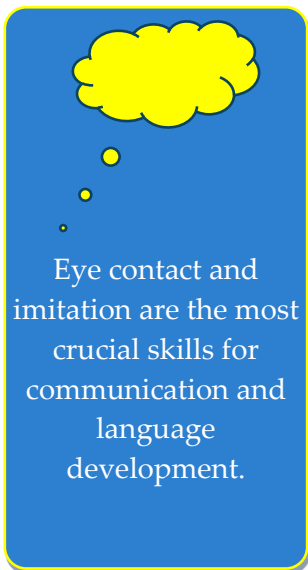
Source: Bony & Frost, 2001, in introduction, p. 12.



Applied Behavior Analysis (ABA) is a system and one of the most effective techniques for teaching communication and other skills to children with autism. Behavioral analysis focuses on the environment and deals with events that occur both before (called antecedents) and after (called consequences) the behavior (Bondy & Frost, 2001). For example, a child tries to open a jar or plastic container containing crayons but fails (the antecedent) and begins to cry (the behavior). Then the child asks or attempts for help properly from their parent/teacher or caregiver (the behavior), and an adult (parent/teacher or caregiver) helps to open the jar or box (the consequences).

Communication and language skills begin with eye contact and imitation of parents or other individuals (e.g., peers, other family members, practitioners, caregivers), then develop through exposure to language and the necessity of speaking the current/present language when needed. Communication and language skills cannot develop without practicing/speaking/communicating with the language. However, first, a child with special educational needs or autism must

possess certain prerequisite skills to provide verbal input and/or develop communication or language abilities. According to the applied behavior analysis system, the components of supportive communication and language skills are: (1) Eye contact (EC), (2) Waiting skills (WS), (3) Turn-taking (TT), (4) Reciprocal conversation (RC), and (5) Imitation skills with and without objects (IM). These are essential for children with special educational needs or autism and should be taught by parents, professionals, or caregivers to further develop their communication and language skills.



2.4.1 Eye contact (EC)

Eye contact means struggling to make and sustain it. For example, difficulties looking at someone and maintaining eye contact. Eye contact is crucial in the development of communication and language skills, particularly in children with autism, in situations referred to as the "autism mood," which means complete closeness in all circumstances or stimulus. Parents, professionals, or caregivers should teach these children the skill of making eye contact to open the communication window and initiate interaction for a child with special educational needs or autism. Caregivers can teach eye contact through natural interaction/teaching or through structured eye contact instruction.

In naturalistic interaction/teaching aimed at teaching eye contact, the caregiver can guide the eyes of a child with special educational needs or autism towards their

own eye contact by using a food reward (e.g., a snack) or a toy that interests the child. Then, if a child with special educational needs or autism makes eye contact with the caregiver, the caregiver can immediately give the child a snack or toy, or have the child take it. When a caregiver gives a child a snack or toy after eye contact, they should verbally reward/reinforce the child (for example, "You looked me in the eyes so nicely," "You looked me in the eyes wonderfully," or "Well done for looking me in the eyes").

Structured eye contact training is divided into four stages. However, first and

foremost, the practitioner or caregiver and the student should sit (on chair, desk or floor) or stand at eye level. The following steps represent the structured teaching process for acquiring eye contact skills:

Step 1 – Verbal Call: The practitioner says to the student, "Look at me," or uses the student's name (e.g., "Hey (or name of the child), look at me"). If the student looks, they are reinforced with verbal praise or other reinforcers (food, drink, tokens, etc.).

Step 2 – Shoulder Touch: If the student doesn't respond despite verbal prompting, the practitioner gently touches the student's shoulder. If the

student responds, reinforcement/reward (e.g., snack and using positive spiking words such as "good job, looking into my eyes very well, etc.) is provided.

Step 3 – Using the Forefinger/Index Finger: If eye contact is still not present, the practitioner takes the index finger of the student's dominant hand and brings it to their (the practitioner's or caregiver's) eye level.

Step 4 – Forefinger/Index Finger Sensation: If the student still cannot make eye contact, the practitioner or caregiver provides a tactile cue by gently squeezing the tip of the student's index finger at eye level.



Whether using a naturalistic or structured method, when teaching eye contact, the practitioner or caregiver and the child should sit or stand at the same eye level.

2.4.2 Waiting skills (WS)

Some children struggle to wait their turn and wait for their reciprocal conversation. For example, waiting stimuli/antecedent (instruction). Therefore, before teaching, waiting for instruction or verbal input, or engaging in conversation, caregivers should first teach children with special educational needs or autism to wait for stand or sit in a specific place. Caregivers can use a “**waiting card**” to teach children with special educational needs or autism to stand or sit in a designated area.

The waiting card is a simple field card and made from A4-sized, red-colored, plastic-coated cardboard/carton. It marks, indicates, or surrounds the area where the child will sit or stand. First, to teach waiting skills, the designated area or specific place where the waiting card will be placed could be a chair that is appropriately sized for the child. In this intervention setting, the child should sit on the waiting card placed on the chair. Second, to teach waiting skills, a designated area or special place where the waiting card can be placed could be a clean floor in the classroom or at home. In this intervention setting, the child should sit cross-legged on the waiting card placed on the floor. Third, to teach waiting skills, a designated area or place can be put where the waiting card can be placed; this could be the floor in the classroom or at home. In this intervention setting, the child should stand on the waiting card placed on the floor. In all settings, the child must sit or stand in the designated waiting area without being distracted and without getting up from the seat or stand field indicated on the waiting card. The second essential material for teaching waiting skills is a "Waiting instruction card" and "Yes" and "No" slips or signs (please see Figure 3).



When teaching waiting skills in a structured way, waiting area cards, waiting instruction cards, and YES/NO signs are used.

During the intervention session, the caregiver should first place the waiting card on the chair, seating area on the floor, or standing area on the floor. Then, the caregiver should direct the child with special educational needs or autism into the waiting card. Then, the caregiver shows the child an instruction card that says "WAIT" and simultaneously says, "Wait here!". If the child waits patiently for a few minutes (for example, three minutes in the first sessions, then the waiting time can be gradually increased) without showing anger or tantrums and without leaving the waiting area, the caregiver should place a "Yes" slip or have the child sign a "WAIT" instruction card, and then provide verbal or food reinforcement. If the child waits properly, the caregiver reinforces immediately and should say that why the child be praised or reinforced (e.g., You waited very well, great job!). If the child does not wait properly for a few minutes, shows anger or tantrums, and leaves the waiting area within the designated time, the caregiver should place a "NO" note or have the child sign a "WAIT" instruction card and then say, "You did not wait properly here," and move on to the next attempt/trial without any reinforcement (please see Figure 3).



Figure 3. *Waiting field card, Wait sign, and Yes/No sign*



Figure 4. *Waiting by sitting on the floor or ground, sitting on a chair, and standing up*

2.4.3 Turn-taking (TT)

Turn-taking is the act of acting taking turns in a situation or conversation. For example, taking one's turn in conversation, play, or other forms of interaction. However, before engaging in conversation, a child with special educational needs or autism must learn when it's their turn during interaction. Turn-taking involves waiting for and observing your opponent, then acting/doing in a similar or identical way to what your opponent does.

The caregiver should sit face-to-face or opposite the child with special educational needs or autism and give them a sequential activity to do in turn. The

caregiver can use play-based exercises to teach turn-taking skills. The phrases "It's my turn" or "My turn" and "It's your turn" or "Your turn" are basic instructions for teaching taking turns speaking skills. Then, the caregiver should say, "Wait and watch what I do," and then, "Now it's your turn, do the same." The chosen play-based exercises should be continued sequentially. If the child correctly follows the rule of taking turns, the caregiver should immediately reward them and explain why the child is being praised, rewarded, or reinforced (e.g., You waited and watched me very well, and then when it was your turn, you did a great job). Turn-taking intervention can be carried out by (1) playing maracas

to each other/reciprocally, (2) rolling a ball to each other and (3) taking turns pressing



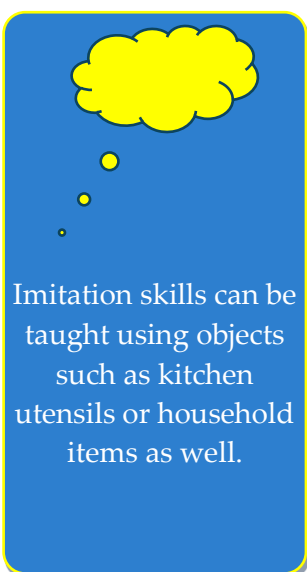
Turn-taking skills involve waiting for and observing your opponent, then doing something similar or identical to what your opponent does.

the button of an electronic musical device (e.g., a musical toy animal button or baby button toy).

2.4.4 Imitation skills with and without objects (IM)

Imitation refers to having little interest in the behavior of others around them and rarely trying to imitate them. For example, imitation of acts by using objects (e.g., shaking a sleighbell, pushing a toy truck); imitating gestures and body movements (e.g., clapping, showing nose); imitating sounds and words (e.g., monkey, chicken sounds).

Imitation skills without objects refers to the ability to act as if one is doing something using only body parts or gestures, without any materials or objects, or to perfectly imitate what an opponent/model is doing. These skills involve showing the child what to do and then asking them to do the same by giving instructions like "Do it this way" or "Do the same thing." A caregiver can use a combination of 5 different actions. For example, (1) pointing or touching to the his/her own nose with own forefinger (index finger) and asking the child to do the same, (2) touching to the his/her own top head with own dominant hand and asking the child to do the same, (3) touching/suppressing to the his/her own chest with own dominant hand and asking the child to do the same, (4) bringing his/her own hands/clap and asking the child to do the same, and (5) pressing the his/her own forefinger on other palm or on a table/ desk and asking the child to do the same (see Figure 5).



Imitation skills with objects include symbolically pretending to do something by using materials/objects or imitating exactly what the opponent/model is doing. For example, pushing a toy car or truck back and forth while simultaneously imitating the sounds of the car or truck. Another example is while combing/brushing a baby's (doll's) hair, simultaneously explaining what you're doing and what the child should

do. For example, stacking wooden blocks or Jenga pieces on top of each other as if building a wall or tower, and asking a child to do the same motion with the objects.

Imitative symbolic play skills (or symbolic imaginary play skills) involve teaching imitation in a hierarchical manner, progressing from real/tangible objects to symbolic imitation. Children with special educational needs, especially those with autism, have difficulty with imitation play skills because they do not know the full function of the object/real material. Therefore, these skills should be taught hierarchically; the practitioner, parent, or caregiver should first teach the actual function of the object. In example of talking on a phone, a caregiver who wants to teach telephone use by mimicking telephone conversations should first begin by teaching how to use the actual material or object, or its actual function. Then, they should teach the following steps. In this context, the caregiver should first simulate a conversation using a real phone (e.g., a smartphone), second use a simulated phone (e.g., a toy smartphone), third use a substitute material instead of a phone (e.g., a wooden block mimicking a smartphone), and finally, simulate using a phone using only their hand without using any tangible material/object.

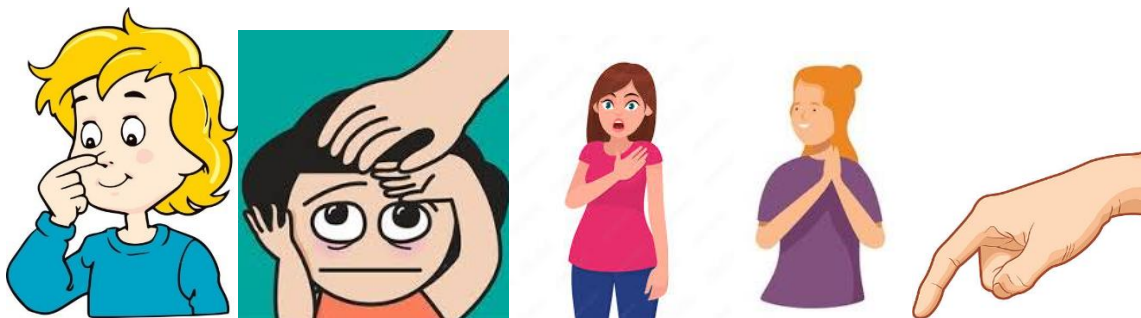


Figure 5. *A combination of 5 different imitation actions without objects.*

If the child accurately imitates/mimics what the caregiver does, the caregiver should immediately reward the child and explain why they are being praised, rewarded, or reinforced (for example, "You imitated me very well" or "You did exactly what I did, you did a great job").

2.4.5 Reciprocal Conversation (RC)

Reciprocal conversation involves responding to social cues, sharing attention, turn-taking in conversations, and displaying appropriate social behaviors. For example, the natural back-and-forth flow in communication. A simple reciprocal conversation contains asking short, clear questions within the context, listening carefully and waiting with expectant glances and gestures, reminding the child of what to say within the context when needed, and verbally reinforcing a child with special educational needs or autism if they respond well during conversation. A caregiver may use or create several options to initiate or maintain a reciprocal conversation with children with special educational needs or autism: for example, a conversation routine about daily tasks or plans, talking about family photos using "wh-questions (who, what, where, when, why, and how so on)", and talking about picture sequences showing subject + object + verb.

To initiate a conversation, the caregiver might ask the child with special educational needs or autism, "what's your plan for today?" or, "what do you want to do this morning or this weekend?". During this reciprocal conversation, the caregiver should listen carefully and wait with expectant glances and gestures, prompt or remind the child of what to say within the context when needed, and verbally reinforce the child if he/she respond properly.

A yellow thought bubble with three small dots leading down to the text.

Using some of the child's family photos can be a good way to start a conversation.

In the second example, the caregiver can make the conversation more concrete and contextual by using some family photos of the child with special educational needs or autism taken at different times and in different contexts. For example, while showing relevant photos to a child with special educational needs or autism, the caregiver might simultaneously ask "wh-questions" such as "What are you doing?", "How was that trip?", "Who is this elderly person?". Then, the caregiver should listen carefully and wait with expectant glances and gestures, prompt or remind the child of what to say within the context when needed, and verbally reinforce the child if he/she respond properly.

Another opportunity to initiate and maintain a reciprocal conversation/dialogue is to talk about sequences of pictures that illustrate the subject + object + verb structure. For example, when showing a child with special educational needs or autism a photograph of the child playing soccer (in which the subject is the child, the object is the soccer ball, and the action of kicking the soccer ball is the verb or action), the caregiver might ask, "What are you doing here?" During the conversation, the caregiver should listen carefully and wait with expectant glances and gestures, prompt or remind the child of what to say within the context when needed, and verbally reinforce the child if he/she responds properly. This example also helps children with special educational needs or autism to improve their pronoun usage and sentence construction.

If the child initiates or maintains a conversation correctly, the caregiver should immediately reward the child and explain why they are being praised, rewarded, or reinforced (for example, "You started a very good conversation with me" or "You listened and spoke wonderfully").

2.5 SUMMARY

The core of modern early intervention for children with language impairments (LI), intellectual and developmental disabilities (IDD) or special educational needs (SEN) is the shift from clinician-only models to caregiver-implemented communication interventions. Because children acquire language within the context of daily interactions, training parents and caregivers to act as the primary interventionists is both ecologically valid and highly effective. These interventions not only improve child linguistic outcomes—such as mean length of utterance (MLU) and vocabulary—but also show exceptionally strong positive effects on parent outcomes, including increased responsiveness and correct use of teaching strategies.

The most prominent frameworks including a naturalistic behavioral intervention utilizes a child's interests to create communication opportunities. Key strategies include: (i) Environmental Arrangement: Sabotaging the environment (e.g., placing toys out of reach) to necessitate a request. (ii) Mand-Modeling: Prompting the child for a response when they show interest in a material. (iii) Incidental Teaching: Following the child's lead to teach functional communication in the moment.

Parents or caregivers, after a short training and coaching session, can significantly improve the correct implementation of these strategies, leading to immediate improvements in their children's language goals. In conclusion, a hierarchical approach should be adopted in intervention: starting with basic skills such as eye contact and imitation and progressing towards functional requesting by encouraging complex social reciprocity. For the adults in a child's life (parents, teachers, and support staff like caregivers), evidence-based education is the most effective way to ensure long-term and overall success in communication and social inclusion.

2.6 PROBLEMS

1. During an intervention, the caregiver moves to a "face-to-face" position to encourage eye contact. This environmental arrangement is primarily intended to:
 - a) Limit the child's movement within the room.
 - b) Increase the salience of the caregiver's social cues.
 - c) Prevent the child from playing with toys.
 - d) Implement a restrictive punishment procedure.
 - e) Transition to a table-top activity.
2. Which strategy is most effective for a child who avoids eye contact when a verbal prompt is given?
 - a) Increasing the volume of the verbal prompt.
 - b) Using a "Time Delay" procedure to wait for a natural look.
 - c) Holding the desired object near the caregiver's eyes.
 - d) Forcing the child's head toward the caregiver.
 - e) Ignoring the child until they look.
3. Which is a characteristic of "socially valid" eye contact in a reciprocal interaction?
 - a) Staring continuously for 60 seconds.
 - b) Brief, functional shifts between the object and the partner.
 - c) Looking only at the floor.
 - d) Closing eyes when spoken to.
 - e) Looking only when a reward is visible.
4. A student is taught to wait for 10 seconds before receiving a snack using a visual timer. This is an example of:
 - a) Negative reinforcement.
 - b) Random teaching.
 - c) Stimulus control through visual support.
 - d) Sensory integration.
 - e) Punishment.

5. During a board game, the caregiver says "My turn" and then "Your turn." This is
- a:
- a) Way to win the game quickly.
 - b) Distraction technique.
 - c) Form of isolation.
 - d) Test of the child's patience only.
 - e) Scripted prompt for turn-taking.
6. Why is turn-taking considering a "reciprocal" skill?
- a) Because it requires a back-and-forth flow between partners.
 - b) Because it only involves one person.
 - c) Because it is a motor skill.
 - d) Because it is taught in a dark room.
 - e) Because it doesn't require communication.
7. A child mimics the caregiver's action of "pushing a car" after a 2-second delay.
- This is:
- a) Vocal imitation.
 - b) Imitation without objects.
 - c) Reciprocal conversation.
 - d) Imitation with objects.
 - e) Waiting skill.
8. If a student can imitate "clapping" but cannot imitate "touching nose," the teacher should apply:
- a) More pressure.
 - b) Verbal abuse.
 - c) Physical prompting (guiding the hands).
 - d) A 10-minute timeout.
 - e) A harder task like "jumping."

9. When a child fails to respond to a conversational prompt, the caregiver waits 5 seconds before repeating. This "Application" of wait time is called:
- a) Time Delay.
 - b) Punishment.
 - c) Ignoring.
 - d) Extinction.
 - e) Distraction.
10. Which skill involves "Imitation" and "Turn-taking" simultaneously?
- a) Eating soup.
 - b) A "Follow the Leader" game where children take turns being the leader.
 - c) Sleeping.
 - d) Looking at a wall.
 - e) Reading a book silently

Answer Key

1.b, 2.c, 3.b, 4.c, 5.e, 6.a., 7.d, 8.c, 9.a, 10.b

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Naturalistic Teaching



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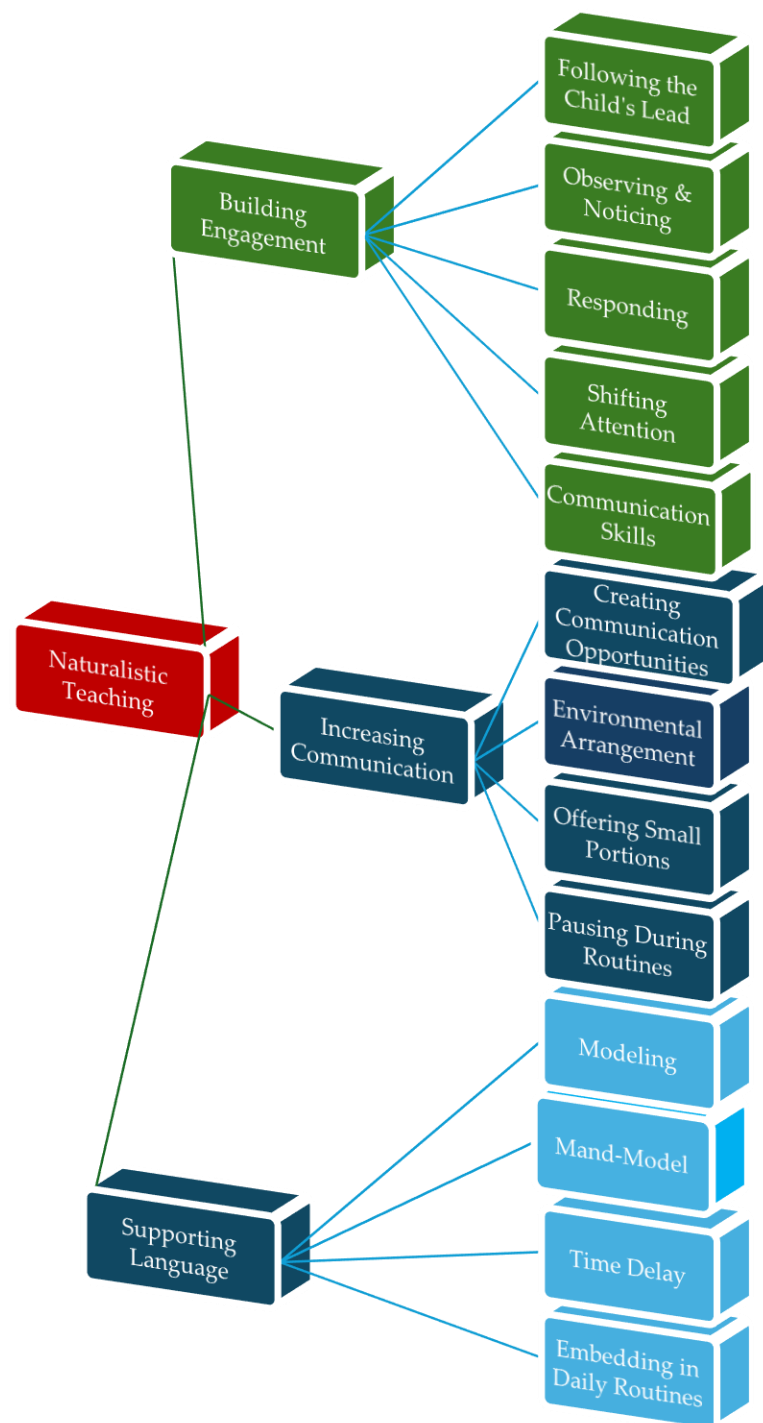


LEARNING OUTCOMES

- After studying this unit;
 - Define naturalistic teaching
 - Describe its purpose
 - Demonstrate how to follow the child's lead
 - Create communication opportunities
 - Model language
 - Use time delay to support independent communication
 - Embed language in routines

THE SPECIAL EDUCATION COURSE BOOK FOR CAREGIVERS Yusuf Akemoğlu, PhD

UNIT NO: 3



3 NATURALISTIC TEACHING

3.1 INTRODUCTION

Communication does not begin at a table. It begins in real life. It begins when a child reaches for a toy, looks toward the refrigerator, pulls a caregiver's hand, or smiles during bath time. These moments are powerful opportunities for learning.

Naturalistic teaching is based on one simple but transformative idea: children learn best when teaching happens within meaningful, everyday experiences.

Caregivers already provide dozens of opportunities for learning each day during meals, dressing, play, bath time, shopping, and bedtime. However, without intentional strategies, these opportunities may pass unnoticed. This unit introduces five essential competencies that help caregivers transform daily interactions into structured, supportive learning experiences.

You will learn how to follow your child's interests, arrange the environment to encourage communication, model and expand language, use time delay strategically, and embed teaching into natural routines. Real life examples are embedded throughout the course book. While learning, you will have the opportunity to reflect on your own practices and identify areas where you may want additional support. Naturalistic teaching does not require special materials. It requires awareness, responsiveness, and intention.

3.2 FOLLOWING THE CHILD'S LEAD



Following the child's lead builds engagement, motivation, and communication.

Following the child's lead means that the caregiver intentionally observes, recognizes, and joins the child's current interests, actions, and focus of attention (Watson, 1998). Instead of directing the activity, the caregiver supports the child's chosen play, materials, and interaction style (Schreibman et al., 2015).

Following a child's lead involves:

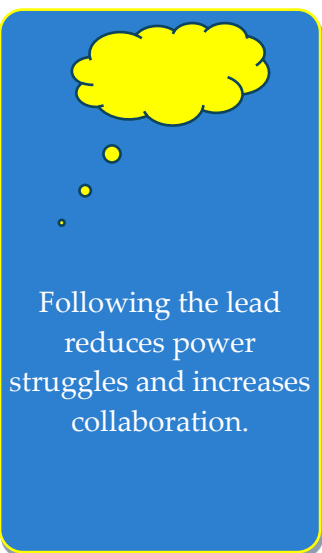
- Allowing the child to participate in activities based on his or her interests
- Supporting the child's actions with materials and people
- Respecting when the child shifts focus
- Staying on the same topic as the child

In naturalistic teaching, this is the first and most essential competency. It establishes engagement, which is the foundation of communication growth. When caregivers follow the child's lead:

- The child stays engaged longer
- The child initiates more interactions
- Communication attempts increase.

3.2.1 Why Following the Child's Lead Is Powerful

Children learn best when they are emotionally invested in what they are doing. Motivation activates attention, and attention activates learning. Children:



- Stay involved longer
- Enjoy activities more
- Do more independently

When adults redirect too quickly, children may:

- Lose focus
- Become resistant
- Show frustration
- Reduce communication attempts

Following the lead reduces power struggles and increases collaboration.

3.2.2 How to Follow the Child's Lead

Step 1-Observe: Observe your what your child is playing and engaged with. Identify what your child enjoys doing and what makes him smile. Provide opportunities for your child to be involved in the activities, play with the materials, and engage in interactions that interest him.

Step 2-Notice: Noticing means, being aware of what your child is doing and identifying the meaningful actions, interactions he is engaged with. A caregiver can improve their “noticing” skills by (a) carefully observing their child’s interest, signals, and emotional investment in certain things he likes, (b) being aware of what the child will try to do, and (c) waiting for child’s interaction and communication attempts.

Step 3-Get at the Child's Level: Caregivers should try to match their positional level with the child's. If the child is on the floor, try getting on the floor, if the child is at a table, sit right across from them at the table. Let them notice you. When the child notices you, this gives them the opportunity to attempt to communicate with you. You can encourage them for more communication by responding to their attempts.

Step 4-Respond: Caregivers can respond to their children while following their lead.

There are two ways to do this. First, imitate their actions and attempts even if they are self-occupied. This helps them notice you. Second, respond calmly and positively when your child tries to interact with you and provides some signals like gestures, emotions (smiles). You can smile back, interpret their communication attempts, and/or meet their desired need.

Step 5-Shift Attention: Watch for when your child seems to lose interest in an activity, material, or person and changes his focus to something or someone else. Shift your attention as your child shifts his attention to other things. Follow your child's lead in interactions throughout the day.



Clear expectations
and consistent limits
help children feel
secure.

3.2.3 What Following the Lead Is NOT

Following the child's lead does not mean letting a child do anything without limits. Safety always comes first. If a child is engaging in unsafe behavior, the caregiver must intervene calmly and provide a safe alternative. Being responsive never means ignoring safety concerns (Akemoglu et al., 2020).

It also does not mean avoiding guidance. Children still need modeling, structure, and support. The difference is that guidance comes after connection.

The caregiver joins the child's activity first, then gently adds language, ideas, or small extensions based on the child's interest (Kaiser et al., 1993).

While following the lead does not eliminate boundaries or routines, having clear expectations and consistent limits help children feel secure and more motivated to learn language and communicate. As such, mealtime, bedtime, and daily routines still have structure. Within that structure, the caregiver can follow the child's interests and build interaction (Lane et al., 2016). Finally, it does not mean never introducing new ideas. New concepts are introduced naturally and in connection with what the child is already doing. The principle is simple: join first, guide later.

3.2.4 Common Mistakes Caregivers Make

Just like the professionals, caregivers also make simple mistakes while trying to follow the child's lead. Here are some examples of how caregivers make mistakes.

- Setting their own agenda of play rather than following the child's agenda
- Demanding the child to follow them
- Testing the child by asking too many questions like "What is this?" "What do you see here?"
- Redirecting the child and having the urge to correct the child

To avoid these, caregivers should:

- Follow the child's lead by observing and noticing the child's actions and interests
- Slowly joining the child's play and interaction
- Imitating the child's action and then adding and modeling new actions without forcing him to repeat them and
- Responding to the child's communication acts

3.3 CREATING COMMUNICATION OPPORTUNITIES

Creating communication opportunities means arranging everyday situations so that the child has a natural reason to communicate (Rakap, 2017). While following the

child's lead builds engagement, this strategy increases initiation. Instead of immediately meeting every need, the caregiver makes small adjustments that gently invite the child to express wants, needs, or ideas.

Communication grows when it has a purpose. If a child receives everything automatically, there is little reason to request or comment. Simple environmental changes can create meaningful opportunities. For example, placing a favorite toy within sight but out of reach, giving small portions of snack, pausing before opening a container, or offering two choices can encourage the child to look, gesture, vocalize, or speak.

Waiting briefly about three to five seconds gives the child time to respond independently. During this pause, the caregiver looks expectantly and stays attentive. If the child attempts to communicate in any way, the caregiver responds immediately and positively.

It is important to keep the balance between challenge and support. The goal is to encourage communication, not frustration. Expectations should match the child's developmental level, and all attempts verbal or nonverbal should be acknowledged. When caregivers consistently create these small opportunities throughout daily routines, children begin to initiate more often and develop greater independence in communication (Kaiser & Roberts, 2013).



3.3.1 What Creating Communication Opportunities Means

Creating communication opportunities means intentionally setting up everyday situations so that a child has a clear and meaningful reason to communicate (Zimmerman & Ledford, 2016). Rather than anticipating every need and responding immediately, the caregiver allows space for the child to initiate. In daily life, adults often move quickly, opening containers, handing over toys, finishing routine before the child has a chance to signal a want or need. While this may feel helpful, it can reduce opportunities for communication. By making small, thoughtful adjustments, caregivers encourage children to use eye gaze, gestures, sounds, or words to interact.

For example, holding a favorite toy for a moment before giving it, offering two choices, or pausing during a familiar activity creates a natural opportunity for the child to respond. These moments are brief and supportive, not demanding. The goal is to help the child experience that communication is effective and powerful. Creating communication opportunities builds independence because the child learns that his or her actions influence the environment (Kaiser & Roberts, 2013).

3.3.2 Environmental Arrangement Strategies

Environmental arrangement plays a central role in creating communication opportunities. Many children do not initiate communication simply because their needs are met too quickly. When adults anticipate and provide everything immediately, the child has little reason to request, comment, or seek assistance (Zimmerman & Ledford, 2016). By slightly adjusting the physical or social environment, caregivers can encourage natural communication.

For example, placing a desired toy within sight but not within reach, giving small portions of food instead of the whole serving, or pausing before opening a container creates a moment in which the child



Environmental arrangement should feel natural, not artificial.

needs to communicate to continue the activity. These small changes increase opportunities for eye contact, gestures, vocalizations, and words.

Environmental arrangement should feel natural, not artificial. It is not about withholding or testing the child. It is about slowing down and giving space for the child to act. When children realize that communication helps them achieve their goals, they become more motivated to initiate. Over time, these repeated, meaningful opportunities strengthen both confidence and independence (Meadan et al., 2016).

3.3.3 Practical Applications in Daily Routines

Parents identify where to use naturalistic teaching across the day during any activity. In these activities, children select what they want to do within a specific environment. For example, Betsy has a target communication skill of labeling animals. Different animal toys are offered during free-choice time, and Betsy decides that she wants to work on an animal puzzle after math center time. To support Betsy's use of the target behavior, the parent may encourage Betsy to request each piece that represents a different animal.

Routine activities take place on a regular basis. Choice making should be built into these routine activities, thus allowing learners to direct the interactions. For example, Devin has a target behavior of using words to request, "more." Each day during snack, his parent presents several tasty options (pretzels, apple slices, cheese cubes, and pudding). She keeps these out of reach and gives very small portions to the students upon their request. These small portions provide students, including Devin, with numerous opportunities to request, "More." Having multiple snack options allows Devin to make choices and direct the interaction.

Planned activities are set-up in advance (i.e., within a lesson plan) to provide opportunities for individual learners to practice the target behavior. Again, choice-making should be built into the activity. For example, a teacher may plan a science

experiment dealing with units of measure. If the target behavior is for Sam to initiate verbal communication, she may have the students find partners, choose objects to measure (allowing the learners to make choices), and then have one student verbally report the findings to his or her partner who is recording the data. The teacher would make sure that Sam is designated as the reporter and provide any necessary prompts to help him verbally report findings to his partner.

Table 6

Examples of Creating Communication Opportunities in Daily Routines

Daily Routine	Caregiver Adjustment	Child Response	Caregiver Response
Snack Time	Give small portions and pause	Looks, reaches, says "more"	Immediately provide more and model "more"
Snack Time	Hold closed container briefly	Points, vocalizes, says "open"	Open container and say "open!"
Play	Stop pushing car and pause	Looks, pushes car toward adult, says "go"	Resume play and say "go car!"
Dressing	Put on one shoe and wait	Looks at other shoe, gestures, says "shoe"	Put on second shoe and label it
Bath Time	Give one toy at a time	Reaches, vocalizes, requests toy	Hand toy and describe action
Mealtime	Offer two choices (e.g., apple or banana)	Points or names choice	Provide chosen item and label it

3.3.3.1 Placing Desired Items in Sight but Out of Reach

One of the most effective strategies is positioning preferred items where the child can see them but cannot access them independently. This immediately creates a reason to communicate. For example:

- Put a favorite toy on a high shelf.
- Place bubbles on the counter.

- Keep snacks in a closed, visible container.

When the child sees the desired item but cannot reach it, he or she may:

- Look at the caregiver
- Reach
- Point
- Vocalize
- Say the item name

The caregiver should wait briefly and respond immediately to any attempt. This strategy increases spontaneous initiation because the motivation is high.



Figure 6. Examples for placing desired items

3.3.3.2 Pausing During a Familiar Routine



Instead of giving the entire item at once, provide small amounts to create repeated opportunities for communication

Pausing at predictable moments invites the child to complete the interaction.

Here are some examples:

- Start singing a favorite song and stop before the last word.
- Push a swing once and pause.
- Begin blowing bubbles and wait.

Children often attempt to:

- Fill in the missing word
- Gesture for continuation
- Say “more” or “again”

This strategy works well because it relies on routine predictability. The child anticipates what should happen next and is motivated to continue it.

3.3.3.3 Offering Small Portions

Instead of giving the entire item at once, provide small amounts to create repeated opportunities for communication.

Examples:

- One cracker instead of the whole bowl
- One puzzle piece at a time
- One block at a time

After giving a small portion, pause. Look expectantly. Allow space for the child to request more. This strategy:

- Encourages repetition of communication
- Builds requesting skills
- Increases interaction turns

It also keeps the interaction ongoing.

3.4 MODELING, MAND-MODEL, AND TIME DELAY

Sometimes, engaging the child in a responsive interaction within an arranged environment will result in the child demonstrating the target communication skill (Akemoglu et al., 2020). However, if the child does not show the target communication skill, more direct naturalistic teaching strategies can be used to bring out the target skills. These strategies include modeling, mand-model, and time delay. Once a child is engaged and initiating communication, the next step is strengthening language itself (Meadan et al., 2016). Together, these strategies increase both the amount and complexity of a child's communication.

Parents should implement these strategies by:

- Establishing shared attention
- Presenting the strategy
- Waiting 3-5 seconds
- Acknowledging the correct response and providing the desired toy/material.

Table 7

Overview of Language Support Strategies in Naturalistic Teaching

Strategy	Primary Purpose	When to Use It	Caregiver Behavior	Child Benefit
Modeling	Increase responding and vocabulary	When child is engaged but not speaking much	Say the target word or short phrase clearly	Builds vocabulary through exposure
Mand-Model	Encourage verbal and non-verbal communication attempt	When child is beginning to use words	Ask simple prompt, wait, then model if needed	Increases word attempts

Strategy	Primary Purpose	When to Use It	Caregiver Behavior	Child Benefit
Time Delay	Promote independent initiation	When child is motivated during routine	Pause 3-5 seconds and look expectantly before helping	Builds independence and initiation

3.4.1 Modeling

Modeling means saying the correct word or short phrase during a meaningful interaction without requiring the child to repeat it. The goal is exposure, not pressure

(Kaiser & Roberts, 2013).

Language should always match the child's focus of attention. If a child pushes a car, the caregiver says, "Car." If the child reaches for juice, the caregiver says, "Juice." Words are most powerful when directly connected to what the child is doing or seeing. Effective modeling is:

- Short and clear
- Related to the child's activity
- Slightly above the child's current level

Modeling includes expanding on language as well. When a child says a word, the caregiver repeats it and adds one meaningful word.

Child: "Car."

Caregiver: "Blue car."

Child: "More."

Caregiver: "More juice."

Language should always match the child's focus of attention.

3.4.2 Mand-Model

Mand-model combines a prompt with a model. It gives the child a chance to respond independently but provides support if needed. The sequence is simple:

- Ask a brief question or give a simple prompt.
- Wait 3-5 seconds.
- If the child does not respond, provide the model.

Here is an example:

Caregiver asks, “What do you want?” and waits 3-5 seconds.

Child says, “Juice” and the caregiver gives the child juice.

The waiting period is important. Many children need processing time before responding. If the caregiver models immediately, the child loses the opportunity to try independently. Mand-model is most useful when the child is beginning to use words but still needs encouragement. However, it should be used thoughtfully. If every interaction becomes a question, communication may feel like a test rather than a conversation. Mand-model should be balanced with simple modeling and natural commenting (Bruinsma et al., 2019).

3.4.3 Time Delay

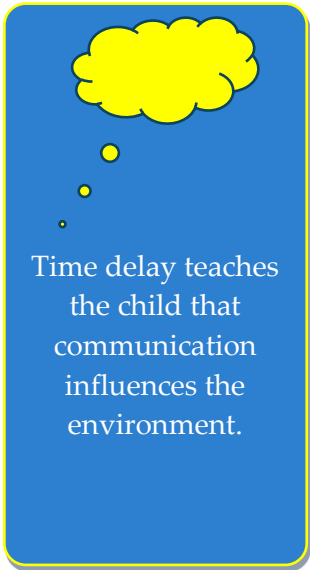
Time delay intentionally builds independence. It involves pausing before helping, giving, or completing an action so the child has an opportunity to initiate (Hancock & Kaiser, 2002). Instead of responding immediately, the caregiver waits 3-5 seconds while maintaining eye contact and an expectant expression. For example:

- Hold bubbles, pause, and look expectantly for your child to say, “more”.
- Start singing, stop before the last word, and look expectantly at your child to say the last word.
- Give one shoe, look expectantly at your child to request for the other shoe.

This brief pause signals that a response is expected. The child may look, gesture, vocalize, or use a word. Time delay teaches the child that communication influences the environment. Over time, initiation increases and prompts decrease (Meadan et

al., 2016).

3.5 EMBEDDING TEACHING IN DAILY ROUTINES



Time delay teaches the child that communication influences the environment.

Naturalistic teaching is most powerful when it happens during everyday life. Children learn best when language and interaction are connected to meaningful, repeated routines. Embedding teaching in daily routines means intentionally using ordinary moments, meals, dressing, bath time, play, and transitions as opportunities for

communication and learning (Rakap, 2017). Instead of setting aside special “teaching time,” caregivers integrate strategies naturally throughout the day. This makes learning feel familiar, predictable, and functional (Diken et al., 2017).

Routines provide predictability therefore they reduce anxiety and increase understanding of what comes next. When children know what happens next, they can focus more on communication. Thus, daily routines provide:

- Repetition
- Clear expectations
- Natural motivation

Because routines occur every day, they offer multiple chances to practice the same skills in meaningful contexts. For example, requesting “more” during snack happens daily. Naming clothing during dressing happens daily. These repeated opportunities strengthen learning and retention.

3.5.1 Embedding Strategies Within Routines

All previously discussed strategies can be integrated into routines:

During Mealtime:

- Follow the child's lead (notice food preferences).
- Create communication opportunities (small portions).
- Model and expand ("Red apple.").
- Use time delay (pause before giving more).

During Dressing:

- Pause before putting on the second shoe.
- Model clothing names.
- Expand requests ("Shoe on." → "Blue shoe on.").

During Play:

- Join the child's activity.
- Hold materials briefly to encourage requests.
- Expand simple words into short phrases.

During Bath Time:

- Label body parts.
- Pause before pouring water.
- Encourage "more" or "again."

The goal is not to add extra work, but to use what already happens.

Table 8

How to Embed Naturalistic Teaching in Daily Routines

Daily Routine	What the Parent Does	What to Say	What to Wait For	What to Do Next
Snack Time	Hold juice but don't open immediately	"Juice" (pause)	Gesture, say "open"	Model "Open juice." and open it
Getting Dressed	Put on one shoe and pause	"Shoe" (pause)	Look at other shoe, say "shoe"	Say "Blue shoe on." and put it on
Play	Hold bubbles and wait	"Bubbles" (pause)	Eye contact, "more," or reach	Blow bubbles and say, "More bubbles!"
Book Reading	Point to picture and pause	"Dog" (pause)	Point or say "dog"	Say "Big dog."
Music Time	Stop before last word of song	"Twinkle, twinkle..." (pause)	Fill in last word	Finish song excitedly
Outside Play	Hold swing still	"Ready..." (pause)	Say "go" or look	Push swing and say "Go!"
Clean Up	Hold toy bin and wait	"Put in" (pause)	Put toy in or say "in"	Say "Toy in box."

3.5.2 Building Consistency Across the Day

Consistency is essential. When caregivers use the same supportive strategies throughout multiple routines, children learn that communication is always meaningful.

Skills learned during one routine begin to transfer to others. A child who learns to request "more" during snack may begin using "more" during play. Embedding teaching increases:

- Generalization

- Independence
- Confidence
- Spontaneous communication

The more natural the context, the more sustainable the learning.

3.5.3 Making Teaching Feel Natural, Not Forced

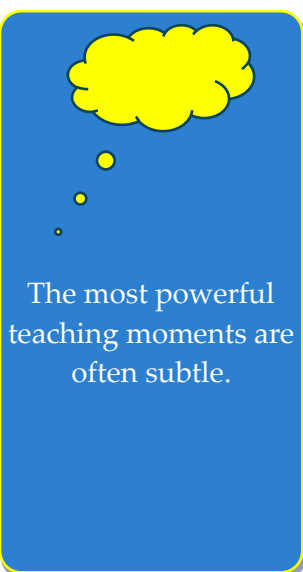
When embedding teaching into daily routines, it is important that interactions feel

natural and enjoyable. Natural and enjoyable interactions come from unforced routines. Therefore, parents must make sure that the interactions and learning opportunities are embedded in their own family's naturally occurring routines and everyday life events (Zimmerman & Ledford, 2016). The child must feel as though he is interacting and not being instructed. To make teaching feel natural, parents should:

- Follow the child's lead and interest
- Respond to the child's interest in a warm manner
- Model the appropriate interaction and communication
- Maintain the natural part of the interaction without changing it

A parent can make their family routines more meaningful by embedding teaching across the day. Simply offering choices during an everyday interaction means embedding naturalistic teaching without interrupting the child's routine. To illustrate:

- A parent can offer choices about where to play by saying, "Joseph, do you want to sit in the chair or on the floor?",
- Offer choices during mealtimes by saying, "Joseph, do you want the blue cup or the red cup?" "Do you want the broccoli or the raisins?" "Do you want milk or juice?"
- Offer choices about what to wear by saying: Joseph, do you want yellow coat or striped coat?" "Green socks or white socks?"



In an ideal naturalistic teaching:

- Interaction is warm and responsive
- Language is connected to the child's focus
- Pauses are brief and supportive
- Success is reinforced immediately

The most powerful teaching moments are often subtle (Kaiser & Roberts, 2013).

3.6 SUMMARY

In this course book, we learned that naturalistic teaching is a collection of practices including following the child's lead, creating communication opportunities, environmental arrangement, modeling, mand-model, and time delay strategies based on behavioral principles. Naturalistic teaching can be used to help children communicate or become more social. It can be useful with children who are not yet using language to communicate as well as children who can communicate with words. Thus, because naturalistic teaching is designed to be used in any setting and throughout the day, skills are more easily generalized.

Parents may have difficulty responding to the communicative attempts of SEN children. However, naturalistic teaching can help the child use rich language within personal interactions with their parents and peers. When this interaction occurs, naturalistic strategies can then be used to achieve the target behaviors.

Naturalistic teaching strategies are designed to support children's communication skills in social settings and daily routines based on their own interests, motivation, and emotional connectedness. When children are interested, they become more motivated and open to learn and thus they start to build complex skills that are naturally reinforcing and appropriate to the interaction.

Therefore, we learned that following the child's is critical for the child's motivation. To follow the child's lead, the parent must observe and notice the child's interest and then join their lead and be responsive to their needs, wants and communication acts. As a follow up, parents can create communication opportunities by adjusting the environment and tweaking their routines. Then, parents can model appropriate language, ask open-ended or choice questions and use pauses to promote child initiation. Finally, parents can implement naturalistic teaching strategies across the child's day and is placed within the child's daily routines and activities. Activities into which naturalistic teaching is embedded can be child-

directed, routine, or planned. Last, but not least, naturalistic teaching has been validated in the research as an effective set of strategies for many children with SEN, ASD, and ID (Dubin & Leiberman-Betz, 2020; Schreibman et al., 2015).

3.7 PROBLEMS

1. Following the child's lead means...
 - a) Teaching new vocabulary during play
 - b) Directing the activity toward learning goals
 - c) Joining the child's current interest
 - d) Asking frequent questions
 - e) Correcting play behavior
2. Which example best demonstrates following the child's lead?
 - a) Observing the child while playing and then joining the play
 - b) Counting blocks during car play
 - c) Introducing a new toy during puzzle time
 - d) Testing color knowledge during snack
 - e) Redirecting the child to another activity
3. Creating communication opportunities involves:
 - a) Responding immediately to all needs
 - b) Waiting for spontaneous speech only
 - c) Increasing correction
 - d) Repeating instructions
 - e) Arranging the environment to encourage requests
4. Giving small portions of snack is effective because it:
 - a) Controls behavior
 - b) Tests vocabulary

- c) Reduces independence
 - d) Creates repeated opportunities to request
 - e) Speeds up routines
5. Modeling means:
- a) Requiring the child to repeat a word
 - b) Saying a new word connected to the child's focus
 - c) Asking a question before speaking
 - d) Correcting grammar directly
 - e) Ignoring incorrect speech
6. Expanding language involves:
- a) Replacing the child's words
 - b) Adding several new sentences
 - c) Adding one meaningful word to the child's utterance
 - d) Correcting pronunciation
 - e) Testing comprehension
7. In mand-model, the caregiver should:
- a) Model immediately without waiting
 - b) Wait briefly before providing the model
 - c) Avoid prompts entirely
 - d) Correct every response
 - e) Use long explanations
8. The purpose of time delay is to:
- a) Encourage independent initiation

- b) Increase dependence
 - c) Reduce communication
 - d) Extend teaching time
 - e) Create frustration
9. Embedding teaching in routines helps because routines are:
- a) Unpredictable
 - b) Rare
 - c) Isolated from daily life
 - d) Only for structured teaching
 - e) Repetitive and meaningful
10. When teaching feels forced, the caregiver should:
- a) Increase demands
 - b) Add more questions
 - c) End interaction
 - d) Simplify and reconnect
 - e) Correct immediately

Answer Key

1.c, 2.a, 3.e, 4.d, 5.b, 6.c, 7.b, 8.a, 9.e, 10.d

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Activity-Based Teaching



THE SPECIAL EDUCATION COURSE BOOK FOR CAREGIVERS

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UNIT NO: 4

CONTENTS

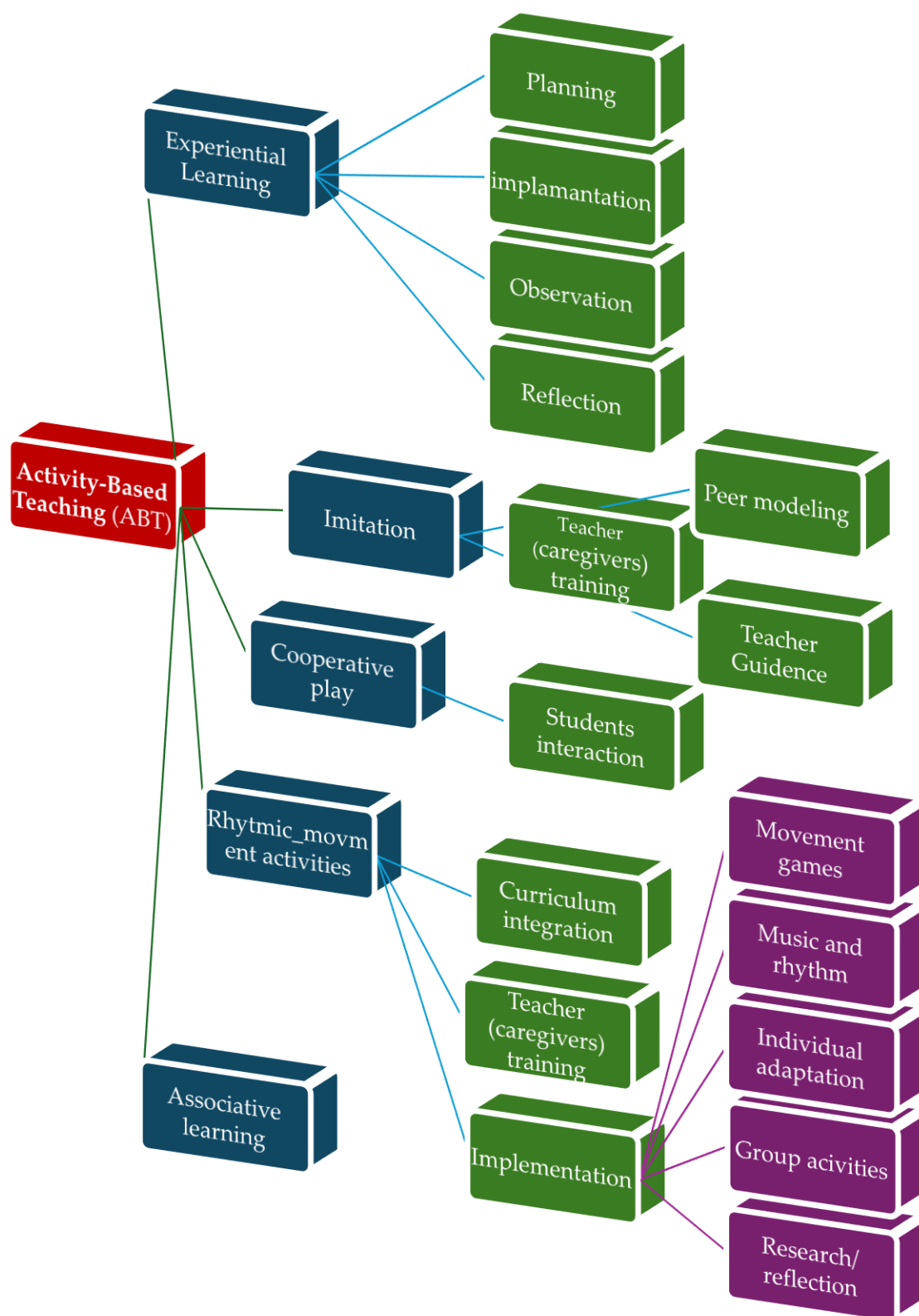


- Introduction
- Activity-Based Teaching
- Module 1: Experiential Learning
- Module 2: Imitation
- Module 3: Cooperative Play
- Module 4: Rhythmic-Movement Activities
- Module 5: Associative Learning

LEARNING OUTCOMES



- **After studying this unit, the reader will:**
 - Describe the principles of activity-based teaching.
 - Explain key activity-based learning approaches.
 - Identify learning opportunities in daily routines.
 - Analyze child engagement in activities.
 - Interpret the impact on inclusion and development.



4 ACTIVITY-BASED TEACHING

4.1 INTRODUCTION

Activity-based teaching is grounded in the understanding that young children learn most effectively through active participation, exploration, and engagement in meaningful everyday experiences. Rather than viewing learning as a separate or isolated process, this approach integrates educational goals into play, movement, routines, and social interaction. Learners may already be familiar with related concepts, such as play-based learning, child-centred education, or experiential learning, from previous units. Activity-based teaching builds on this prior knowledge by demonstrating how intentional teaching can occur within natural contexts that children find motivating and relevant (Bredekamp, 2014).

Contemporary early childhood research emphasises that learning is a socially mediated process shaped by interaction with peers, adults, and the environment. Previous subjects may have introduced developmentally appropriate practice, inclusive education, and the role of observation in understanding children's needs. Activity-based teaching connects these foundations by highlighting the educator's role in planning environments and activities that support communication, social development, independence, and participation for all children (DEC, 2014; NAEYC, 2020).

This unit presents activity-based teaching as a flexible yet structured approach that supports diverse learners, including children with developmental delays and disabilities. It provides guidance on embedding learning goals into daily routines and using natural motivation to enhance engagement. The unit introduces five key modules—experiential learning, imitation, cooperative play, rhythmic-movement activities, and associative learning—and explains how each contributes to holistic child development. Through practical examples and reflective guidance, learners will explore how everyday activities can become powerful teaching tools when applied

intentionally. By linking theory with practice, this unit supports the creation of inclusive learning environments where all children can actively participate, feel competent, and experience success (Barton & Smith, 2015).

4.2 ACTIVITY-BASED TEACHING

Activity-Based Teaching (ABT) emphasises that young children learn most



Key Points

Children learn through active, meaningful play; adults facilitate. It promotes inclusion, cooperation, imitation, movement, and real-life skill development.

effectively through active engagement in meaningful, real-life activities rather than through isolated instruction. This approach integrates educational goals into everyday routines, play, movement, and social interactions, making learning natural, motivating, and developmentally appropriate (Bredekamp, 2014). Learners who are already familiar with play-based learning, child-centred approaches, or experiential learning can build on these prior concepts to understand how ABT extends and structures these strategies for intentional teaching.

In ABT, the adult's role shifts from traditional instruction to facilitation. Educators plan environments, observe children, and adapt activities to individual needs while embedding learning objectives into daily experiences. This approach supports communication, social interaction, independence, and inclusion for all children, including those with developmental delays, autism spectrum disorder, or physical and health-related disabilities (Barton & Smith, 2015; DEC, 2014). By using everyday activities as teaching opportunities, ABT promotes engagement, self-confidence, and competence in a natural and meaningful way. The unit introduces five key subdomains of ABT that guide practical application.

Experiential learning enables children to construct knowledge through direct experiences and reflection. Imitation allows children to acquire language, motor, and social skills by observing and copying peers. Cooperative play fosters social problem-solving, turn-taking, and peer collaboration. Rhythmic-movement activities

enhance attention, regulation, and participation through movement and music. Finally, associative learning helps children create meaningful connections between actions, objects, and outcomes, supporting understanding and independence (NAEYC, 2020; Barton & Smith, 2015).

This unit provides practical guidance on embedding these strategies into everyday settings, highlighting the benefits of structured yet flexible approaches for inclusive early childhood education. Learners will explore how intentional use of ABT modules can transform routine activities into powerful learning opportunities, allowing all children to participate actively, develop essential skills, and experience success while fostering a sense of belonging and inclusion.

4.2.1 Theoretical and Methodological Background of Activity-Based Teaching

ABT is grounded in contemporary educational theories that emphasise active learner engagement, meaningful experiences, and social interaction as key drivers of learning. Rather than focusing on passive knowledge transmission, ABT views learning as a dynamic process that occurs through purposeful activities embedded in everyday routines and play. This instructional framework aligns with constructivist and sociocultural perspectives, which highlight the importance of experience, interaction, and context in children's cognitive and social development (Fleer, 2011; Hedges & Cullen, 2012).

From a methodological standpoint, ABT integrates structured planning with flexible implementation, allowing educators to respond to individual learners' needs while maintaining clear developmental goals.

The pedagogical principles of ABT include learner-centred instruction, guided participation, scaffolding, and the intentional use of the environment as a learning resource. Teachers act as facilitators who design meaningful activities, observe



Activity-Based
Teaching
(ABT)
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Activity-Based
Learning
(ABT)

children's responses, and adjust support to promote independence, communication, and engagement (Bredekamp, 2014; NAEYC, 2020).

This theoretical and methodological foundation provides a coherent framework for understanding how activity-based strategies can be systematically applied across different learning domains. It also serves as a basis for the modules presented in this unit, illustrating how theory is translated into practical, inclusive teaching approaches that support diverse learners in early childhood settings.

4.2.2 From Learning Theory to Practice in Activity-Based Teaching (Ages 2–7)

Translating the theoretical foundations of Activity-Based Teaching into everyday educational practice is particularly important in early childhood, when learning is most effective through play, exploration, and social interaction. For children aged 2–7 years, development occurs holistically across cognitive, social, emotional, motor, and communication domains. ABT responds to these developmental characteristics by embedding learning opportunities within meaningful activities that reflect children's natural interests and daily experiences.

In practice, ABT requires both planning and flexible implementation. Educators design activities that are developmentally appropriate, culturally responsive, and adaptable to individual needs, including those of children with disabilities or developmental delays. Rather than directing learning through formal instruction, teachers facilitate experiences, observe children's engagement, and provide scaffolding to support emerging skills such as imitation, cooperation, self-regulation, and problem-solving (Fleer, 2011; Bredekamp, 2014).

For young children, structured routines, peer interaction, and hands-on activities create predictable and motivating contexts for learning. The role of the teacher is to guide participation, model desired behaviours, and adjust support to promote independence and confidence. Through this approach, theoretical principles

such as constructivism and social learning are transformed into practical strategies that support inclusive, activity-rich environments for children aged 2–7 years (NAEYC, 2020).

The instructional framework of Activity-Based Teaching integrates well-established learning theories with developmentally appropriate educational practice for young children. As demonstrated in Table 1. Theoretical Foundations and Practical Application of ABT (Ages 2–7), ABT translates theoretical principles such as constructivism, sociocultural learning, experiential learning, and social learning into concrete instructional strategies embedded in everyday activities.

Table 9

Theoretical Foundations and Practical Application of ABT (Ages 2–7)

Learning Theory	Key Principles	ABT Application (Ages 2–7)
Constructivism	Children build knowledge through active experience	Hands-on play, exploration with materials, and learning through trial and error
Sociocultural Theory	Learning occurs through social interaction	Peer tutoring, cooperative play, guided participation with adults
Experiential Learning	Learning is rooted in meaningful experiences.	Daily routines, role-play, real-life activities (e.g., self-care, classroom tasks)
Social Learning Theory	Children learn by observing and imitating others	Peer modelling, imitation games, and teacher demonstrations
Developmentally Appropriate Practice	Teaching must match developmental levels	Adapted activities, flexible goals, individualised support

This connection between theory and practice ensures that learning experiences are meaningful, inclusive, and responsive to the developmental needs of children aged 2–7 years. By grounding instructional decisions in theory while maintaining flexibility in implementation, educators can create environments that support active

engagement, peer interaction, and holistic development. The table provides a clear overview of how abstract theoretical concepts are operationalised through play-based, routine-based, and socially mediated activities, reinforcing the role of Activity-Based Teaching as a coherent and evidence-informed pedagogical approach.

4.2.3 Activity-Based Teaching Modules Introduction

ABT is most effective when its theoretical principles are translated into clearly structured and intentionally designed learning experiences. The following

submodules represent core areas through which Activity-Based Teaching can be systematically implemented in early childhood education for children aged 2–7 years. Each submodule focuses on a specific aspect of learning that naturally emerges through play, social interaction, and everyday routines.



Activity-Based Teaching Submodules

- Experiential Learning
 - Imitation
 - Cooperative Play
- Rhythmic-Movement Activities
- Associative Learning

→ Together supports the development

Activity-Based Teaching reaches its full potential when theoretical principles are consistently translated into intentionally planned and developmentally appropriate learning experiences. In the context of early childhood education in the Czech Republic, this approach aligns closely with the principles of the Framework Educational Programme for Preschool Education (RVP PV), which emphasises learning through play,

experiential activities, and everyday routines as the foundation of children's development (Ministry of Education, Youth and Sports [MŠMT], 2021).

The following submodules represent key areas through which Activity-Based Teaching can be systematically implemented with children aged 2–7 years in kindergartens and early childhood settings. Each submodule focuses on a specific aspect of learning that naturally emerges from children's active engagement, social interaction, and meaningful participation in daily activities. This structure reflects both international research in early childhood pedagogy and long-standing

traditions of Czech preschool education that prioritise holistic development and child-centred learning (Bredekamp, 2014; Opravilová, 2016).

The selected submodules—Experiential Learning, Imitation, Cooperative Play, Rhythmic-Movement Activities, and Associative Learning—correspond to and reflect fundamental developmental pathways in early childhood. Together, they support the development of cognitive, communication, social, emotional, and motor competencies while respecting individual developmental differences. From an inclusive perspective, these submodules create natural opportunities for participation for children with developmental delays, disabilities, social disadvantage, or different language backgrounds, as learning takes place within shared, meaningful contexts (Syslová, 2019; NAEYC, 2020).

These submodules are not intended to be used in isolation; rather, they complement one another and can be flexibly combined according to children's individual needs, interests, and developmental levels. Within each submodule, emphasis is placed on practical application, developmentally appropriate strategies, and the active role of both children and educators. The modules guide readers on how everyday activities can be transformed into meaningful learning opportunities, supporting participation, engagement, and a sense of competence for all children, including those with developmental delays, disabilities, or social disadvantage (Průcha, 2017; Flear, 2011).

Importantly, the submodules are not intended to function as isolated instructional units. In accordance with both Czech and international pedagogical frameworks, they are designed to be flexibly combined and adapted to children's needs, interests, and abilities. Emphasis is placed on practical application, the role of the educator as a facilitator of learning, and the transformation of everyday situations—such as play, routines, movement, and peer interaction—into rich learning opportunities that foster engagement, autonomy, and a sense of competence for all children (Průcha, 2017; Flear, 2011).

4.3 MODULE 1, EXPERIENTIAL LEARNING



Activity-Based Teaching Submodules

- Experiential Learning

Experiential learning represents one of the core pillars of Activity-Based Teaching and plays a fundamental role in early childhood education worldwide. The concept is grounded in the understanding that children learn most effectively through direct experience, active engagement, and reflection on meaningful activities. Rather than acquiring knowledge through passive instruction, children construct understanding by interacting with their environment, materials, peers, and adults. This approach is particularly relevant for children aged 2–7 years, whose learning is closely linked to sensory exploration, movement, play, and social participation (Kolb, 2015; Bredekamp, 2014).

In international early childhood education frameworks, experiential learning is recognised as a developmentally appropriate and inclusive approach that supports holistic development. It aligns with constructivist and sociocultural theories, emphasising learning as an active, socially mediated process embedded in real-life contexts (Vygotsky, 1978; Flear, 2011). Within Activity-Based Teaching, experiential learning transforms everyday situations—such as play, routines, and practical tasks—into intentional learning opportunities that foster autonomy, motivation, and competence.

In the Czech context, experiential learning closely aligns with the principles of preschool education outlined in the Framework Educational Programme for Preschool Education (RVP PV), which emphasises learning through play, experience, and meaningful activity as central to children's development (MŠMT, 2021). Although terminology may differ, the underlying pedagogical philosophy closely aligns with experiential principles commonly described in the international literature.

4.3.1 Experiential Learning: Theoretical Background

Experiential learning is most associated with the work of Kolb, who defined learning as a cyclical process involving concrete experience, reflective observation, abstract

conceptualisation, and active experimentation (Kolb, 2015). In early childhood, this cycle is often implicit rather than consciously structured; young children experience, experiment, and reflect through play, imitation, and interaction without formal verbalisation.

Constructivist theory provides a foundational framework for experiential learning by emphasising that knowledge is actively constructed rather than transmitted. Children interpret new experiences based on prior understanding, gradually reorganising their cognitive structures through exploration and problem solving (Piaget, 1964).

Sociocultural theory further expands this view by highlighting the role of social interaction, language, and guided participation in learning processes (Vygotsky, 1978).

Recent international research emphasises that experiential learning in early childhood should be embedded in authentic activities that are meaningful to the child. Fler (2011) argues that learning is most effective when children engage in concept-rich play that integrates imagination, action, and social interaction. This theoretical perspective supports the Activity-Based Teaching approach, where educators intentionally design environments and activities that invite exploration, cooperation, and shared meaning-making.

In Czech preschools, experiential learning has long been reflected in approaches that prioritise "prožitkové učení" (learning through experience), spontaneous play, and everyday activities as key learning contexts (Opravilová, 2016; Syslová, 2019). These principles resonate strongly with international theoretical models, despite differences in terminology.



Experiential Learning

Theoretical Foundation comes from

- Kolb work
- Vygotsky

4.3.2 Experiential Learning in Early Childhood Practice (Ages 2–7)

In practice, experiential learning for children aged 2–7 years occurs through active participation in play-based and routine-based activities. These include free play, guided exploration, creative activities, self-care routines, outdoor play, and cooperative tasks. Learning emerges naturally as children manipulate objects, make choices, test ideas, and interact with peers and adults.

Within ABT, the educator's role is not to rigidly dictate learning outcomes but to create conditions that support exploration and reflection. ABT involves preparing stimulating environments, offering appropriate materials, observing children's interests, and providing scaffolding when needed (Bredekamp, 2014). Through sensitive guidance, educators help children extend their experiences, develop problem-solving skills, and connect actions with outcomes.

Experiential learning is particularly beneficial for inclusive early childhood settings. Children with developmental delays, disabilities, or social disadvantage benefit from concrete, hands-on experiences that reduce reliance on verbal instruction and abstract concepts. Everyday activities—such as preparing snacks, tidying up, building structures, or participating in group games—offer accessible learning opportunities that support communication, independence, and social participation (NAEYC, 2020).

In Czech early childhood practice, experiential learning is commonly integrated into daily routines in kindergartens, where children learn through practical activities, outdoor experiences, and cooperative play. This approach supports the RVP PV emphasis on holistic development and individualisation, allowing educators to adapt learning experiences to children's developmental levels and needs (MŠMT, 2021).

4.3.3 Experiential Learning within Activity-Based Teaching



Experiential Learning

Activity-Based
Teaching (ABT)

Activity-Based
Learning (ABL)

Within Activity-Based Teaching, experiential learning functions as a unifying framework that connects theoretical principles with everyday educational practice. It provides a foundation for other submodules—such as imitation, cooperative play, and rhythmic-movement activities. Experiential learning ensures that learning remains meaningful, contextualised, and closely connected to children's real lives.

By engaging children in active experiences, ABT promotes intrinsic motivation and supports the development of autonomy and self-efficacy. Children are not passive recipients of instruction but active participants in their own learning processes. This approach fosters deeper understanding, as knowledge is constructed through action, reflection, and social interaction rather than memorisation (Kolb, 2015).

From an inclusive perspective, experiential learning supports participation and belonging by valuing diverse abilities and learning styles. It allows children to succeed at their own pace and in their own way, strengthening confidence and engagement. In both international and Czech educational contexts, experiential learning represents a cornerstone of high-quality early childhood education and a key component of ABT.

Table 10

Adaptation of Kolb's Experiential Learning Cycle for Children Aged 2–7

Kolb's Learning Phase	Phase Description	Application (2–7 years)	Activity Example	Educator's Role
Concrete Experience	Children actively participate in real-life or play-based activities.	Learning occurs through sensory exploration, movement, and direct interaction with materials and peers.	Children build a tower using blocks or prepare fruit during snack time.	Provide safe, stimulating materials and encourage exploration.
Reflective Observation	Children observe the results of their actions and begin to notice patterns or outcomes.	Reflection occurs through discussion, imitation, and observation of peers.	Children notice why the tower fell or compare their work with others.	Ask guiding questions and encourage children to describe their experiences.
Abstract Conceptualisation	Children begin to form simple concepts or understand cause-and-effect relationships.	Understanding develops through conversation, storytelling, or demonstration.	Children realise that bigger blocks create stronger foundations.	Support language development and help children verbalise their understanding.
Active Experimentation	Children apply new understanding to future activities.	Children modify behaviour, test new strategies, and solve problems.	Children rebuild the tower using stronger base structures.	Encourage problem-solving and allow repeated practice.

The experiential learning cycle provides a structured framework for understanding how young children transform everyday experiences into meaningful

learning. As illustrated in Table , each stage of Kolb's cycle can naturally be embedded in play-based and routine-based activities typical of children aged 2–7. In early childhood education, the cycle does not occur as a strictly linear process; rather, children move flexibly between stages through exploration, repetition, and social interaction. The educator plays a crucial role in facilitating reflection, supporting concept formation, and encouraging experimentation, ensuring that experiential learning contributes to holistic child development (Kolb, 2015; Bredekamp, 2014).

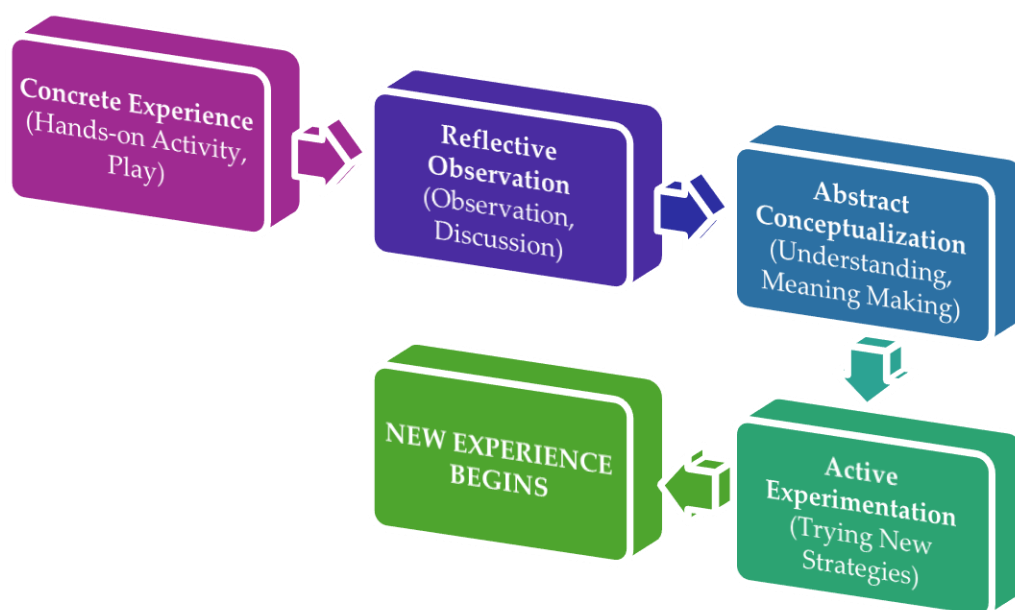


Figure 7. Experiential Learning Cycle Adapted for Early Childhood (2–7 Years)

In early childhood settings, Kolb's learning cycle does not follow a rigid or linear structure. Instead, children naturally move between phases through play, routines, and social interaction. For children aged 2–7 years, experiential learning often begins with concrete sensory experiences and gradually develops into reflection and conceptual understanding supported by adult guidance (Kolb, 2015; Bredekamp, 2014).

In the Czech preschool context, this cyclical learning process is commonly observed during play-based learning, outdoor exploration, and daily routines, where children repeatedly experience, reflect, and experiment in meaningful situations (MŠMT, 2021; Opravilová, 2016). The educator plays a crucial role in facilitating transitions between learning phases by creating opportunities for reflection, providing language support, and encouraging problem-solving.

4.4 MODULE 2, IMITATION

Imitation is one of the most fundamental mechanisms of early learning and a core component of Activity-Based Teaching in early childhood education. From infancy through the preschool years, children acquire language, social behaviours, motor patterns, and problem-solving strategies by observing and reproducing others' actions. In educational contexts, imitation serves as a natural bridge between observation and active participation, making it especially relevant for children aged 2–7 years.



Imitation

A central process in
social learning

Observing peers and
adults

Dramatization
Cooperative play

International research highlights imitation as a central process in social learning and cognitive development. Through observing peers and adults, children internalise behavioural patterns, communication strategies, and social norms (Bandura, 1977; Meltzoff, 2013). In inclusive early childhood environments, imitation supports participation and engagement by providing accessible learning pathways, particularly for children with developmental delays or communication difficulties (Ingersoll & Schreibman, 2010; NAEYC, 2020).

Within the Czech preschool tradition, imitation is embedded in everyday pedagogical practice, especially in routines, movement activities, dramatisation, and cooperative play. Although often not explicitly labelled as a separate instructional strategy, it is naturally integrated into learning situations that emphasise modelling, shared experience, and guided participation (Opravilová, 2016; MŠMT, 2021).

4.4.1 Theoretical Background of Imitation

The theoretical roots of imitation are most prominently associated with social learning theory, which emphasises that children learn by observing others and modelling their behaviour (Bandura, 1977). According to this perspective, learning involves attention, retention, reproduction, and motivation. For young children, imitation is not merely copying behaviour; it represents an active cognitive and social process through which meaning is constructed.

Developmental research has further demonstrated that imitation supports language acquisition, emotional understanding, and the development of theory of mind (Meltzoff, 2013). In early childhood settings, imitation fosters joint attention and social reciprocity—skills that are foundational for later academic and social success. From a sociocultural perspective, imitation is closely linked to guided participation and scaffolding within the child's zone of proximal development (Vygotsky, 1978). When adults or more competent peers model actions, children are supported in performing tasks slightly beyond their independent abilities. This principle is particularly important in inclusive settings, where peer modelling often enhances engagement and skill acquisition (Ingersoll & Schreibman, 2010).

In Czech pedagogical discourse, imitation is reflected in the emphasis on learning through shared activities, dramatisation, and cooperative tasks, where children naturally observe and reproduce actions within meaningful contexts (Syslová, 2019).

4.4.2 Imitation in Practice: Application for Children Aged 2–7

In early childhood education, imitation occurs in both spontaneous and structured contexts. Young children imitate gestures, speech patterns, emotional expressions, and problem-solving strategies during play and daily routines. Within Activity-Based Teaching, imitation becomes an intentional pedagogical tool.

Imitation-based activities examples:

- Movement games ("Follow the leader")
- Songs with gestures
- Demonstration of self-care routines (washing hands, dressing)
- Peer modelling during cooperative tasks
- Role-play and dramatisation

For children aged 2–7 years, imitation supports:

- Language development
- Motor coordination
- Social competence
- Emotional regulation
- Understanding of classroom routines

Imitation is particularly beneficial for children with autism spectrum disorder (ASD), developmental delays, or limited verbal communication. Structured imitation activities reduce cognitive demands and provide clear behavioural models, increasing participation and success (Ingersoll & Schreibman, 2010).



Imitation is suitable for:

- ✓ Children with ASD
- ✓ Developmental Delay
- ✓ Limited Verbal Communication

In Czech kindergartens, imitation is frequently embedded in morning circles, movement activities, dramatisation, and music education. Teachers model actions and behaviours while encouraging peer participation, consistent with RVP PV principles that emphasise experiential and socially mediated learning (MŠMT, 2021).

4.4.3 Imitation within Activity-Based Teaching

Within ABT, imitation functions as a mechanism that connects observation with active engagement. It allows children to enter learning situations with confidence, as they can rely on models provided by adults or peers. ABT reduces anxiety and

supports inclusion, especially for children who may struggle with abstract instruction.

Imitation also strengthens peer relationships. When children imitate one another, they engage in reciprocal interaction, which fosters empathy, cooperation, and shared understanding. In ABT environments, peer modelling becomes a powerful inclusive strategy that supports both children with and without additional support needs.

Importantly, imitation should not be limited to mechanical repetition. Educators are encouraged to move children from simple reproduction to adaptation and creativity gradually. In this way, imitation becomes the first step in a broader experiential learning cycle, supporting autonomy and independent problem-solving (Kolb, 2015). Table 11 illustrates the multidimensional nature of imitation in early childhood by distinguishing between motor, verbal, social, emotional, and functional forms. This categorisation reflects the understanding that imitation is not limited to simple behavioural copying but is a complex developmental mechanism that supports language acquisition, social cognition, and emotional regulation (Meltzoff, 2013). In line with social learning theory, these forms of imitation demonstrate how observational learning contributes to children's competence and participation in everyday educational contexts (Bandura, 1977).

Table 11

Imitation Forms Imitation in Early Childhood (Ages 2-7)

Type of Imitation	Description	Example in Early Childhood Setting	Developmental Benefit
Motor Imitation	Copying physical movements	Clapping patterns, obstacle courses	Motor coordination, body awareness
Verbal Imitation	Repeating sounds or words	Echoing new vocabulary during circle time	Language development
Social Imitation	Copying peer behaviour in play	Pretend play scenarios	Social understanding
Emotional Imitation	Mirroring emotional expressions	Comforting a peer	Emotional regulation
Functional Imitation	Replicating practical tasks	Washing hands after the demonstration	Independence, routine learning

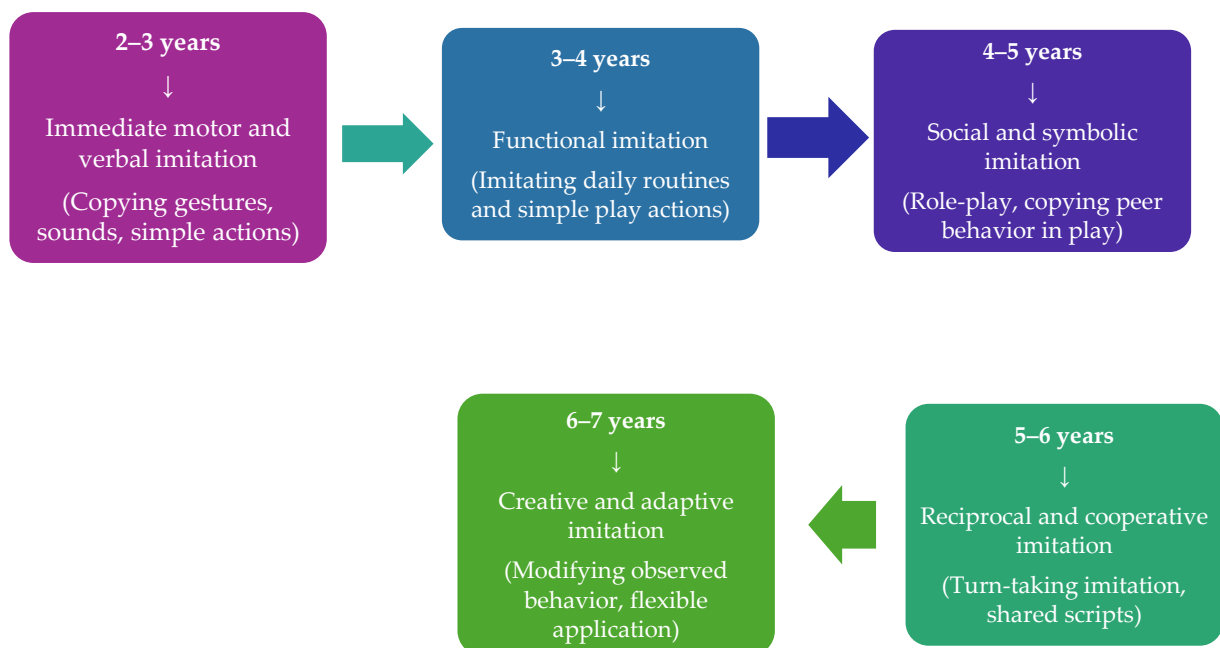


Figure 8. Developmental Line of Imitation in Early Childhood: Developmental Progression of Imitation (Ages 2–7)

Table 11 and Figure 8 further emphasise the developmental progression of imitation between the ages of 2 and 7. The progression from immediate motor

imitation to adaptive and creative imitation corresponds with children's increasing cognitive flexibility, symbolic thinking, and social reciprocity. Developmental research indicates that imitation evolves from direct copying toward intentional, socially mediated, and context-sensitive behaviour (Ingersoll & Schreibman, 2010; Vygotsky, 1978).

Imitation develops from simple motor copying toward socially complex and cognitively flexible behaviour. In Activity-Based Teaching, this progression allows educators to intentionally scaffold imitation from structured modelling toward independent and creative application (Bandura, 1977; Meltzoff, 2013).

Table 12

Developmental Characteristics of Imitation (2–7 Years)

Age	Type of Imitation	Typical Behavior	Educational Implication (ABT)
2–3 years	Immediate imitation	Copies gestures, facial expressions, and simple words	Use songs with gestures, simple movement games
3–4 years	Functional imitation	Repeats daily routines, tool use	Model self-care and classroom routines
4–5 years	Symbolic imitation	Engages in pretend play, imitates roles	Support dramatisation and thematic play
5–6 years	Reciprocal imitation	Takes turns copying peers	Use peer modelling and cooperative tasks
6–7 years	Adaptive imitation	Modifies actions creatively	Encourage problem-solving and innovation

Within ABT, this developmental trajectory is particularly significant. It allows educators to scaffold learning experiences appropriately, moving from structured modelling for younger children to cooperative and creative applications for older preschoolers. Such progression aligns with developmentally appropriate practice in early childhood education (NAEYC, 2020) and reflects the emphasis on experiential,

socially embedded learning present in Czech preschool pedagogy (MŠMT, 2021). Together, the tables and figures provide a conceptual and practical framework for understanding imitation as both a developmental process and an instructional strategy within inclusive early childhood settings.

Table 13

Key Takeaways: Imitation in Activity-Based Teaching (Bandura, 1977; NAEYC, 2020)

Core Insight	Key Points
Imitation – Developmental Mechanism	• Imitation supports cognitive, social, and language development. • It enables children to learn through observation and participation. • It strengthens joint attention and social reciprocity. • It builds confidence through accessible modelling.
Imitation - Instructional Strategy in ABT	• Structured modelling enhances inclusion and participation. • Peer imitation fosters cooperation and empathy. • Development progresses from simple copying to creative adaptation.

Table 13 synthesises the essential principles of imitation as a developmental and instructional mechanism within Activity-Based Teaching (ABT). The table highlights imitation not merely as behavioural copying, but as a foundational socio-cognitive process that supports language acquisition, social competence, and self-regulation in children aged 2–7 years.

Research consistently demonstrates that imitation functions as a bridge between observation and internalisation of knowledge (Bandura, 1977). In early childhood, children learn new behaviours, communication patterns, and problem-solving strategies primarily through observing significant adults and peers. Meltzoff (2013) further explains that imitation contributes to the development of self–other understanding, which is crucial for empathy and cooperative interaction.

Within the ABT framework, imitation becomes pedagogically intentional. Teachers serve as structured models, while peers act as natural social mediators of learning. ABT aligns with developmentally appropriate practice principles (National Association for the Education of Young Children [NAEYC], 2020) and the Czech Framework Educational Programme for Preschool Education (MŠMT, 2021), both of which emphasise learning through interaction, participation, and guided activity.

Importantly, Table 13 underscores that effective use of imitation requires adult scaffolding, gradual fading of support, and sensitivity to individual developmental levels. When integrated thoughtfully into daily routines, imitation strengthens inclusive participation and supports children with diverse learning needs.

4.5 MODULE 3, COOPERATIVE PLAY

Cooperative play represents a central developmental domain in early childhood and a core mechanism through which Activity-Based Teaching (ABT) can be effectively

implemented. Between the ages of 2 and 7, children gradually move from parallel play to organised cooperation, shared goals, negotiated roles, and collaborative problem-solving. In this period, play becomes not only a source of enjoyment but also a fundamental context for social, linguistic, emotional, and cognitive development (Bodrova & Leong, 2015; Whitebread et al., 2017).

From a developmental perspective, cooperative play builds upon earlier forms of social participation. Parten (1932) identified cooperative play as the most socially complex stage of early childhood play, characterised by shared intentions and coordinated action. In cooperative play, children do not merely play side by side; they actively engage with one another, co-construct meaning, negotiate rules, and pursue common objectives.



Cooperative play

- a natural learning environment where knowledge is constructed through interaction.

Within the framework of Activity-Based Teaching, cooperative play is viewed as a natural learning environment where knowledge is constructed through interaction. This perspective aligns with sociocultural theory, which emphasises that learning first occurs on the social level and is then internalised (Vygotsky, 1978). Cooperative activities create opportunities for peer scaffolding and shared regulation, thereby supporting both cognitive growth and social competence.

In the Czech preschool context, cooperation and social competence are explicitly emphasised in the Framework Educational Programme for Preschool Education (MŠMT, 2021), which highlights communication, respect for others, and collaborative participation as key developmental outcomes. Cooperative play, therefore, represents not only a theoretical construct but also a practical pedagogical strategy aligned with national educational priorities.

4.5.1 Cooperative Play: Theoretical Background

The conceptual foundations of cooperative play draw primarily from three theoretical traditions:

- 1. Developmental Classification of Play** - Parten (1932) described the progression of social participation in play from solitary and parallel forms to associative and cooperative play. Cooperative play typically emerges around ages 4–5, when children demonstrate the ability to organise shared activities and coordinate roles.
- 2. Sociocultural Theory** - Vygotsky (1978) argued that social interaction is the driving force of cognitive development. In cooperative contexts, children operate within the Zone of Proximal Development, supporting one another through shared problem solving and dialogue.
- 3. Self-Regulation and Executive Function** - Contemporary research highlights that mature forms of cooperative play significantly contribute



Theory behind Cooperative Play

- Developmental Classification
- Sociocultural Theory of Vygotsky
- Self-Regulation and Executive Function

to the development of executive functions, including planning, cognitive flexibility, and inhibitory control (Bodrova & Leong, 2015; Whitebread et al., 2017).

Within ABT, cooperative play is understood as:

- a natural context for social learning,
- a vehicle for inclusive participation,
- a framework for developing communication and negotiation skills,
- a setting for meaningful engagement and shared success.

4.5.2 Cooperative Play: Developmental Characteristics

Table 14 and Figure 9 illustrate the gradual shift from loosely coordinated interaction toward structured collaboration. This progression reflects increasing perspective-taking abilities, communicative competence, and executive functioning (Whitebread et al., 2017). In the ABT framework, the adult's role transitions from active modelling in early stages to facilitative scaffolding in later stages, consistent with guided participation theory (Rogoff, 2003).

In the Czech preschool system, cooperative learning is supported through curricular emphasis on social competence, communication skills, and responsible participation in group activities (MŠMT, 2021). Cooperative play, therefore, aligns with both international research and national educational expectations. The development of cooperative play is not strictly linear. Children may move between stages depending on context, temperament, and peer dynamics. In inclusive settings, intentional scaffolding can significantly enhance cooperative engagement.

Table 14

Developmental Characteristics of Cooperative Play (Ages 2–7)

Age	Typical Characteristics	Teacher Support in ABT
2–3 years	Mainly parallel play; brief shared moments	Modelling sharing, simple joint actions

3–4 years	Emerging turn-taking; short cooperative episodes	Guided small-group activities
4–5 years	Shared goals; basic role play	Facilitating role distribution
5–6 years	Negotiation; organised pretend scenarios	Supporting conflict resolution
6–7 years	Complex group projects; rule-based games	Gradual withdrawal of scaffolding

Figure 10 illustrates the gradual developmental transition from early forms of social proximity toward fully organised cooperative interaction. This progression reflects qualitative changes in children's social cognition, communication abilities, emotional regulation, and executive functioning between the ages of two and seven.

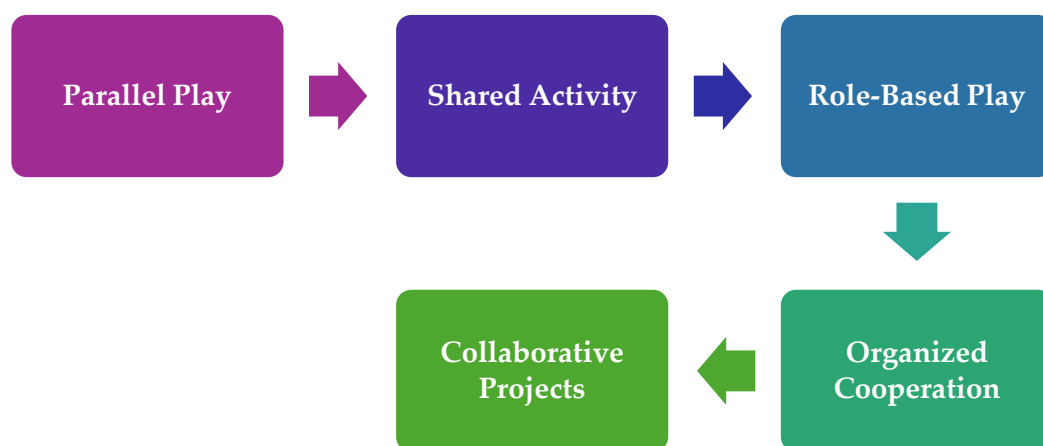


Figure 9. Developmental Progression of Cooperative Play (Ages 2–7)

At the earliest stage, parallel play is characterised by physical proximity without coordinated interaction. Although children may use similar materials or engage in comparable activities, shared intentionality is limited. However, even this stage represents an important foundation for later cooperation, as children observe peer behaviour and begin to internalise social norms (Parten, 1932; Whitebread et al., 2017).

The transition to shared activity marks the emergence of joint attention and simple turn-taking. At this stage, children demonstrate growing awareness of others' intentions and begin to coordinate actions for short periods. According to Vygotsky (1978), such moments of shared engagement provide a context in which higher psychological functions begin to develop through social interaction.

Role-based play represents a significant developmental milestone. Children begin to assign roles (e.g., "doctor," "shopkeeper," "builder") and adhere to implicit or explicit rules within pretend scenarios. This stage requires perspective-taking, symbolic thinking, and emerging self-regulation (Bodrova & Leong, 2015). The ability to maintain a shared narrative structure indicates increasing executive control and cognitive flexibility.

Organised cooperation and collaborative projects, typically emerging between ages five and seven, involve planning, negotiation, conflict resolution, and sustained shared goals. Children demonstrate the capacity to divide responsibilities, adapt strategies, and reflect on outcomes. These advanced forms of cooperation align with research on the relationships among play, executive function, and school readiness (Whitebread et al., 2017).



Importantly, Figure 10 does not represent a strictly linear developmental pathway. Children may move fluidly between stages depending on context, peer dynamics, and adult support. Within Activity-Based Teaching (ABT), the educator's role evolves across this

progression—from modelling and mediating in early stages to facilitating and gradually withdrawing scaffolding in later stages. This approach reflects guided participation and the gradual release of responsibility (Rogoff, 2003).

In the Czech preschool context, the emphasis on cooperation, communication, and social responsibility outlined in the Framework Educational Programme for Preschool Education (MŠMT, 2021) corresponds closely with the developmental

trajectory depicted in Figure 10. Cooperative play is therefore not only a developmental phenomenon but also a pedagogical priority aligned with both international research and national curricular expectations. Overall, Figure 10 underscores that cooperative play is a dynamic, developmental process through which children construct knowledge, negotiate social meaning, and build competencies essential for lifelong learning.

4.5.3 Cooperative Play in Practice: ABT Scenario

Example Activity: "Building a City Together" (Ages 4–6)

- **Objective:** To develop communication, planning, and collaborative problem-solving.
- **Activity Structure** (ABT Framework):
- **Introduction:** Discussion about what a city includes (homes, roads, shops, and a hospital).
- **Role Assignment:** Architect, builder, designer, traffic planner.
- **Construction Phase:** Children collaboratively build using blocks and materials.
- **Reflection:** What worked well? What was challenging? How did we solve problems?
- **To support diverse learners in inclusive settings**
- Visual role cards can assist children with language delays.
- Simplified tasks or peer pairing can support children with developmental challenges.
- Adaptive materials can ensure the participation of children with physical disabilities.
- **Role of the Teacher in ABT**
- Facilitator of dialogue

- Language model
- Mediator of conflicts
- Observer of social interaction
- Provider of scaffolding when necessary

The activity "Building a City Together" represents a structured example of how cooperative play can be intentionally implemented within the Activity-Based Teaching (ABT) framework. Although the activity appears simple, it integrates multiple developmental domains simultaneously and reflects core principles of sociocultural learning theory.

From a cognitive perspective, the activity promotes planning, spatial reasoning, categorisation, and early mathematical thinking. When children decide where roads, houses, or public buildings should be placed, they engage in problem-solving and symbolic representation. Such activities support executive functions, including working memory, inhibitory control, and cognitive flexibility (Bodrova & Leong, 2015; Whitebread et al., 2017).

From a social-developmental standpoint, the structured assignment of roles (e.g., architect, builder, designer) encourages negotiation, perspective-taking, and shared responsibility. Children must coordinate actions, communicate intentions, and adjust to peer suggestions. These processes align with Vygotsky's (1978) concept of learning through social interaction within the Zone of Proximal Development, where peers act as co-constructors of knowledge. Importantly, the ABT framework emphasises intentional adult facilitation rather than direct instruction. In this scenario, the teacher's role includes:

- Structuring the environment (materials, space, visual supports),
- Modelling appropriate communication,
- Encouraging reflective dialogue,
- Mediating conflicts constructively,

- Gradually reducing support as children gain competence.

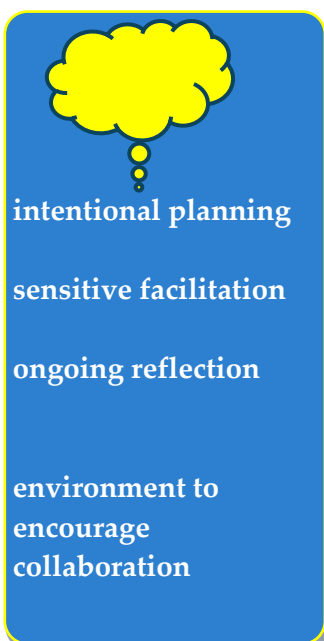
This approach reflects guided participation (Rogoff, 2003) and developmentally appropriate practice principles (NAEYC, 2020), ensuring that learning remains child-centred yet pedagogically purposeful. The reflective phase of the activity ("What worked well?" "How did we solve problems?") is particularly significant. Reflection consolidates experiential learning and promotes metacognitive awareness, even in early childhood (Kolb, 1984; Whitebread et al., 2017). Through guided discussion, children begin to recognise strategies, emotions, and collaborative dynamics, strengthening both self-regulation and social understanding.

Such adaptations align with inclusive education principles embedded in Czech preschool policy (MŠMT, 2021) and international recommendations for equitable participation in early childhood settings (Barton & Smith, 2015). Overall, the "Building a City Together" scenario exemplifies how cooperative play within ABT is not incidental but strategically structured to promote social competence, cognitive development, inclusion, and school readiness. The activity demonstrates that meaningful collaboration transforms play into a multidimensional learning experience.

4.5.4 Practical Implications for Teachers

Effective implementation of cooperative play within Activity-Based Teaching (ABT) requires planning, sensitive facilitation, and ongoing reflection. Teachers play a crucial role in transforming spontaneous peer interaction into meaningful developmental learning opportunities.

First, educators should intentionally design the environment to encourage collaboration. It means arranging materials that require shared use (e.g., large construction sets, collaborative art supplies) and creating spaces that promote face-



to-face interaction. Research indicates that structured environments significantly increase the likelihood of cooperative engagement (Bodrova & Leong, 2015).

Second, teachers should model and scaffold communication strategies such as turn-taking, negotiation, and conflict resolution. Rather than solving problems for children, educators should guide them through reflective dialogue (e.g., "What solution could work for both of you?"), thereby supporting executive function and social regulation (Whitebread et al., 2017).

Third, differentiation is essential in inclusive classrooms. Visual supports, simplified role structures, peer pairing, or adapted materials can ensure equitable participation for children with developmental delays or disabilities (Barton & Smith, 2015). Cooperative play becomes inclusive when adult support is responsive rather than directive.

Fourth, reflective discussion after activities strengthens learning consolidation. Brief group reflection helps children recognise successful strategies, emotional experiences, and collaborative processes, reinforcing metacognitive awareness even in early childhood (Kolb, 1984).

Finally, teachers should gradually withdraw scaffolding as children demonstrate increasing competence. This gradual release of responsibility aligns with sociocultural theory and promotes autonomy and confidence (Vygotsky, 1978; Rogoff, 2003). In summary, cooperative play in ABT is most effective when educators act as facilitators of shared meaning, designers of collaborative environments, and reflective guides who support both developmental growth and inclusive participation.

Table 15

Key Takeaways: Cooperative Play in Activity-Based Teaching (NAEYC, 2020)

Core Principle	Key Insight
Developmental Progression	Cooperative play evolves from parallel interaction to organised collaboration.
Social Construction of Learning	Knowledge is co-constructed through peer interaction (Vygotsky, 1978).
Executive Function Support	Cooperation strengthens planning, flexibility, and self-regulation.
Role of Scaffolding	Adult guidance supports negotiation and conflict resolution.
Inclusion and Participation	Structured cooperation promotes a sense of belonging and equitable engagement.
Reflection Matters	Post-activity reflection consolidates learning and social awareness.
Gradual Release	Teacher support decreases as children gain competence and autonomy.

This structure, along with all the information above, ensures that the activity remains purposeful, socially meaningful and developmentally appropriate. In summary, the key takeaways of cooperative play in ABT are as follows:

- Cooperative play integrates social, cognitive, and emotional development.
- It develops progressively from parallel interaction to structured collaboration.
- Adult scaffolding is essential in the early stages.
- Peer interaction promotes inclusion and belonging.
- Cooperative activities integrate multiple developmental domains simultaneously.

Table 15 summarises the core pedagogical principles of cooperative play within the Activity-Based Teaching framework. As outlined in the table, cooperative play supports developmental progression from parallel interaction to structured collaboration while simultaneously strengthening executive functions, social

competence, and inclusive participation. The table also highlights the importance of intentional scaffolding, guided reflection, and gradual release of responsibility in fostering children's autonomy (Vygotsky, 1978; NAEYC, 2020). Together, these principles reinforce cooperative play as a multidimensional and developmentally grounded strategy in early childhood education.

4.6 MODULE 4, RHYTHMIC MOVEMENT ACTIVITIES

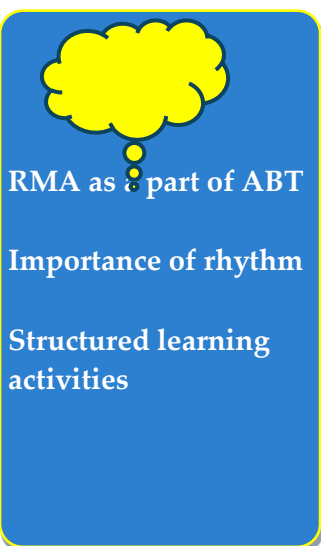
Rhythmic-Movement Activities (RMA) represent an essential component of Activity-Based Teaching (ABT) in early childhood education. Between the ages of 2 and 7,

movement is not only a physical need but also a primary medium for learning, communication, and self-regulation. When movement is combined with rhythm, music, and structured repetition, it becomes a powerful tool for supporting cognitive, motor, linguistic, and socio-emotional development (Gordon, Fehd, & McCandliss, 2015; Phillips-Silver & Keller, 2012).

In early childhood, rhythm organises experience. Through clapping patterns, movement games, action songs, and coordinated group activities, children internalise temporal structure, sequencing, and anticipation. These processes are foundational for language development, executive functioning, and emergent literacy (Gordon et al., 2015).

Emerging neuroscientific findings suggest that rhythmic activities are associated with neural consistency and auditory processing development (Tierney & Kraus, 2017). Integrating physical movement into cognitive tasks has been shown to enhance vocabulary acquisition and retention in preschool children (Mavilidi, Okely, Chandler, & Paas, 2018).

Within the Czech preschool context, movement and rhythmic activities are strongly embedded in daily routines, including morning circles, seasonal songs, and



structured physical play. The Framework Educational Programme for Preschool Education (MŠMT, 2021) emphasises physical development, coordination, and expressive movement as integral components of holistic child development. Rhythmic-movement activities, therefore, align with both international developmental research and national curricular priorities. In ABT, RMA is not an isolated physical exercise; rather, it is an intentionally structured learning experience that integrates movement with cognition, communication, and social interaction.

4.6.1 Rhythmic Movement Activities: Theoretical Background

Rhythmic-Movement Activities (RMA) are grounded in interdisciplinary theoretical perspectives that connect motor development, cognitive psychology, neuroscience, music pedagogy, and sociocultural learning theory. In early childhood (ages 2–7), rhythm and movement function as organising principles of experience, shaping perception, attention, memory, and social interaction. The theoretical foundations of RMA draw from three primary domains:

4.6.1.1 Embodied Cognition, Sensory-Motor Foundations

Embodied cognition theory suggests that cognitive processes are deeply rooted in

bodily experience, more precisely in bodily interaction with the environment. Movement supports memory, attention, and conceptual understanding (Shapiro, 2019). When children move rhythmically, they are not merely exercising—they are organising cognitive processes through sensorimotor engagement. For young children, learning is not abstract but sensorimotor. Concepts such as sequence, tempo, pattern, and anticipation are first experienced physically before being symbolically represented. Rhythmic-motor activities provide structured repetition and patterned movement that support neural integration. Through clapping, stepping, swaying, or coordinated gestures, children internalise temporal structures that later underpin linguistic rhythm, syllable segmentation, and narrative organisation. Thus, movement becomes a scaffold for

emerging cognitive abstraction. In early childhood pedagogy, this perspective reinforces the importance of integrating physical engagement into learning rather than separating "academic" and "motor" domains.

4.6.1.2 Neurodevelopmental Perspectives on Rhythm and Timing

Research indicates that rhythmic entrainment (synchronising movement to a beat) supports neural timing mechanisms associated with language processing and executive control (Gordon et al., 2015). Early rhythmic experience contributes to phonological awareness and temporal processing. Neuroscientific research suggests that rhythmic synchronisation (entrainment) strengthens neural networks responsible for timing, prediction, and attention (Gordon, Fehd, & McCandliss, 2015). The ability to align movement with external rhythm supports auditory discrimination and phonological processing, both of which are foundational for early literacy development. Temporal processing plays a crucial role in:

- 
- ✓ Embodied Cognition
 - ✓ Sensory-motor Foundations
 - ✓ Neurodevelopmental Perspectives on Rhythm and Timing
 - ✓ Sociocultural, Self-Regulation, and Co-Regulation Frameworks
 - ✓ Developmentally Appropriate and Inclusive Practice
 - ✓ Integration within Activity-Based Teaching

- speech perception,
- syllable segmentation,
- turn-taking in communication,
- inhibitory control.

Phillips-Silver and Keller (2012) emphasise that rhythmic entrainment is not merely musical but fundamentally social and cognitive. Synchronisation with others activates neural systems associated with cooperation and shared intentionality. In early childhood classrooms, coordinated rhythmic movement therefore contributes to both individual regulation and group cohesion.

4.6.1.3 Sociocultural, Self-regulation, and Co-regulation frameworks

From a sociocultural perspective, rhythmic activities represent shared cultural practices through which children participate in collective meaning-making (Vygotsky, 1978). Songs, chants, movement games, and circle dances are culturally embedded forms of learning that transmit norms, values, and communicative patterns. Group rhythmic activities promote emotional regulation through shared tempo and synchronised action. Coordinated movement enhances social bonding and cooperative engagement (Phillips-Silver & Keller, 2012). In ABT, such shared regulation is foundational for inclusive participation. Group rhythmic engagement promotes co-regulation—the process by which children regulate their behaviour through interaction with others. When children synchronise movement, they adjust tempo, intensity, and timing in response to peers. This shared regulation gradually becomes internalised as self-regulation. Such processes are closely linked to executive function development (Whitebread et al., 2017). Structured rhythmic routines support:

- impulse control,
- sustained attention,
- behavioural flexibility,

- emotional stabilisation.

Within Activity-Based Teaching (ABT), rhythmic-movement activities thus serve as structured social learning environments where regulation is practised in embodied and relational ways.

4.6.1.4 Developmentally Appropriate and Inclusive Practice

Developmentally appropriate practice (NAEYC, 2020) emphasises active, engaging, and socially meaningful learning experiences. Rhythmic-movement activities meet these criteria by combining physical engagement, repetition, and group participation. Importantly, RMAs are highly adaptable and inclusive

- Children with language delays benefit from non-verbal rhythmic cues.
- Children with attention difficulties respond positively to structured movement.
- Children with motor challenges can participate through adapted gestures or seated movement.

The Czech Framework Educational Programme for Preschool Education (MŠMT, 2021) explicitly supports physical expression, rhythmic coordination, and movement as integral components of holistic development. RMA therefore align with both international research and national curricular priorities.

4.6.1.5 Integration within Activity-Based Teaching

Within ABT, rhythmic-movement activities are not supplementary but integrative. They connect:

- Motor development
- Language acquisition
- Social bonding
- Emotional regulation
- Executive functioning

By embedding rhythm into daily transitions, thematic units, and cooperative tasks, educators create predictable yet dynamic learning environments. Structured repetition combined with gradual complexity ensures developmental progression while maintaining engagement. Thus, the theoretical background of RMA demonstrates that rhythm is not merely artistic expression—it is a foundational developmental organiser that supports cognition, communication, and social integration in early childhood.

4.6.2 Developmental Characteristics of RMA

The developmental characteristics of rhythmic-movement activities between ages 2 and 7 reflect a gradual shift from spontaneous, sensory-based movement toward

intentional, coordinated, and socially regulated rhythmic performance. In the early stages, children engage primarily through imitation and repetition, which support sensorimotor integration and emotional regulation.



The rhythmic-movement activities between ages 2 and 7 reflect a gradual shift from spontaneous, sensory-based movement toward intentional, coordinated, and socially regulated rhythmic performance.

As development progresses, rhythmic participation becomes increasingly structured, requiring sequencing, memory, inhibitory control, and synchronisation with peers (Gordon et al., 2015; Whitebread et al., 2017). By ages 6–7, children demonstrate the capacity for independent rhythmic leadership and collaborative coordination, indicating the development of executive function and

self-regulation. Within Activity-Based Teaching, these developmental characteristics guide educators in selecting appropriately scaffolded, inclusive, and progressively complex rhythmic experiences (NAEYC, 2020).

Table 16 illustrates that rhythmic-movement development between ages 2 and 7 progresses from spontaneous sensorimotor engagement to structured, self-

regulated coordination and leadership. As shown in the table, rhythmic activities gradually integrate motor control, sequencing ability, executive functioning, and social synchronisation.

Within the Activity-Based Teaching framework, this progression highlights the importance of age-appropriate scaffolding, predictable structure, and gradual transfer of responsibility to the child (Gordon et al., 2015; NAEYC, 2020). Rhythmic-movement activities, therefore, function as developmental bridges connecting physical experience with cognitive organisation and social regulation. Development during this period involves increasing coordination, timing accuracy, and the ability to synchronise with others.

Table 16

Developmental Overview of Rhythmic-Movement Activities in Early Childhood (Ages 2–7)

Age	Typical Rhythmic-Motor Behaviours	Teacher Support in ABT
2–3 years	Spontaneous movement to music; simple imitation	Modelling basic actions, repetition
3–4 years	Imitating short movement sequences	Clear visual and auditory cues
4–5 years	Coordinated clapping, group movement games	Structured rhythmic patterns
5–6 years	Following multi-step rhythmic sequences	Integrating rhythm with language tasks
6–7 years	Independent participation in rule-based movement games	Encouraging leadership and peer guidance

Table 17

Developmental Progression, Cognitive Processes, and Pedagogical Implications of Rhythmic-Movement Activities (Ages 2–7)

Age	Rhythmic – Motor Characteristics	Cognitive & Socio-Emotional Processes	Implications for ABT Practice
2–3 years	Spontaneous body movement to music; simple imitation of gestures; enjoyment of repetition	Sensorimotor integration; emerging joint attention; basic emotional regulation through movement	Use short, repetitive songs; model simple actions (clap, stomp); provide visual cues and a consistent approach.
3–4 years	Imitation of short rhythmic sequences; beginning synchronisation with the adult; simple action songs	Developing sequencing ability, early inhibitory control, and imitation-based learning	Introduce call-and-response games; combine rhythm with simple language patterns; maintain predictable structure.
4–5 years	Coordinated clapping or stepping patterns; participation in circle games; maintaining a shared approach.	Improved working memory; increased peer awareness; emerging self-regulation	Incorporate small-group rhythmic tasks; integrate counting and syllable segmentation; scaffold turn-taking.
5–6 years	Following multi-step rhythmic sequences, adjusting movement to group pace, and rule-based movement games	Strengthening executive functions (planning, flexibility); cooperative synchronisation; emotional co-regulation	Introduce patterned sequences (A–B–A); connect rhythm to storytelling or literacy tasks; gradually reduce modelling.
6–7 years	Independent rhythm leadership; creation of movement sequences; coordinated group choreography	Advanced cognitive flexibility; metacognitive awareness; collaborative regulation	Encourage peer leadership; integrate rhythm into project-based learning; promote reflection on coordination and teamwork.

The expanded version of Table 17 demonstrates that rhythmic-movement development between ages 2 and 7 involves more than increasing motor coordination. It reflects progressive integration of sensorimotor control, executive functioning, linguistic structuring, and social synchronisation.

Analytical commentary on the expanded table, in the youngest children (2–3 years), rhythmic engagement primarily supports sensory integration and emotional regulation. Movement acts as a regulatory mechanism, helping children stabilise arousal levels through predictable repetition (Shapiro, 2019). Teacher modelling and consistency are therefore crucial at this stage. Between the ages of 3 and 5, children begin to internalise rhythmic patterns, which support sequencing skills and early phonological awareness. Research indicates that rhythm perception is closely linked to language processing and syllabic segmentation (Gordon et al., 2015). Rhythmic imitation strengthens memory and inhibitory control, both of which are essential for school readiness. Between the ages of 5 and 7, children demonstrate the capacity for sustained synchronisation and rule-based coordination. At this stage, rhythmic activities contribute significantly to the development of executive functions and collaborative competence (Whitebread et al., 2017). Leadership opportunities further promote autonomy and confidence.

Importantly, development remains context sensitive. Some children may require additional scaffolding or visual supports, especially in inclusive settings. Rhythmic-movement activities offer adaptable structures that enable equitable participation, aligning with developmentally appropriate practice (NAEYC, 2020) and the Czech preschool curriculum (MŠMT, 2021).

Overall, the table illustrates that rhythmic-movement activities serve as developmental bridges—linking motor engagement with cognitive structuring, language development, and social cohesion within the Activity-Based Teaching framework.

4.6.3 Practical Implications for Teachers:



The rhythmic-movement activities between ages 2 and 7 reflect a gradual shift from spontaneous, sensory-based movement toward intentional, coordinated, and socially regulated rhythmic performance.

4.6.3.1 Rhythmic-Movement Activities in Practice: ABT Scenario

Rhythmic-Movement Activities (RMA) are most effective within the Activity-Based Teaching (ABT) framework when they are intentionally structured, developmentally appropriate, and embedded into daily routines. Rather than functioning as isolated "movement breaks," rhythmic activities should be understood as integrative learning experiences that simultaneously support motor coordination, language development, executive functioning, and social regulation. As children gain competence, scaffolding should

be reduced, allowing increased autonomy and peer leadership (Vygotsky, 1978; Rogoff, 2003).

In summary, rhythmic-movement activities within ABT are structured yet flexible learning experiences that connect embodied action with cognitive organisation and social regulation. Through intentional design and reflective facilitation, teachers transform movement into a powerful developmental catalyst.

4.6.3.2 Designing Rhythmic-Movement Activities in ABT: Effective implementation requires three core principles:

- 1. Predictable Structure with Gradual Complexity** - Young children benefit from repetition and clear rhythmic patterns. Teachers should begin with simple, repetitive sequences and progressively introduce variation. Predictability supports emotional security and self-regulation, while incremental complexity stimulates cognitive growth (NAEYC, 2020).
- 2. Embodied Language Integration** - Combining rhythm with speech (chants, rhymes, syllable clapping) strengthens phonological awareness and sequencing

abilities (Gordon et al., 2015). Movement becomes a physical anchor for linguistic processing.

3. Shared Regulation and Social Synchronisation - Group rhythmic activities foster co-regulation. When children move in synchrony, they adjust to shared tempo and collective timing, reinforcing attention and cooperative engagement (Phillips-Silver & Keller, 2012). Integrating RMA into daily classroom life, when rhythm becomes part of the classroom culture, it supports both academic readiness and emotional climate.

- Morning circle routines
- Transition periods
- Literacy preparation (syllable clapping, sound segmentation)
- Thematic units (seasonal songs, cultural dances)
- Conflict resolution moments (regulated breathing with rhythm)

Table 18

Example Activity: "Rhythm and Action Circle" (Ages 3–6)

Objective: Strengthen self-regulation, sequencing, and group coordination. This activity integrates auditory processing, motor planning, and social synchronisation.

Activity Structure:

1. Warm-Up:
The teacher introduced a simple clapping pattern.
 2. Rhythmic Modelling:
The teacher introduces a simple clapping pattern (e.g., clap–clap–pause).
Clear visual and auditory cues are provided.
 3. Imitation Phase:
Children repeat and extend the rhythm (tap shoulders, turn around).
 4. Movement Integration:
Adding coordinated body movements (stomp, clap, turn).
 5. Group Synchronisation:
The group performs the sequence together, maintaining shared tempo.
 6. Leadership Rotation:
Children take turns leading the rhythm.
-

7. Reflection:

Reflection consolidates experiential learning and strengthens metacognitive awareness (Kolb, 1984). We ask the children:

"How did we stay together?"

"What helped us follow the rhythm?"

Teacher's Role:

- Maintain predictable structure
- Provide clear rhythmic modelling
- Encourage the participation of all children
- Gradually transfer leadership
- Model – demonstrating clear rhythmic patterns
- Facilitator – supporting participation without dominating
- Regulation Guide – helping children maintain tempo and focus
- Observer – monitoring coordination and engagement
- Gradual Releaser of Responsibility – encouraging child-led rhythm creation

Inclusive Adaptations:

Such differentiation aligns with inclusive early childhood principles and supports equitable participation (MŠMT, 2021; NAEYC, 2020).

- Visual rhythm cards support children with language delays.
 - Seated or simplified movements enable children with motor challenges to participate.
 - Slower tempo supports children with attentional difficulties.
 - Peer pairing encourages inclusive engagement.
-

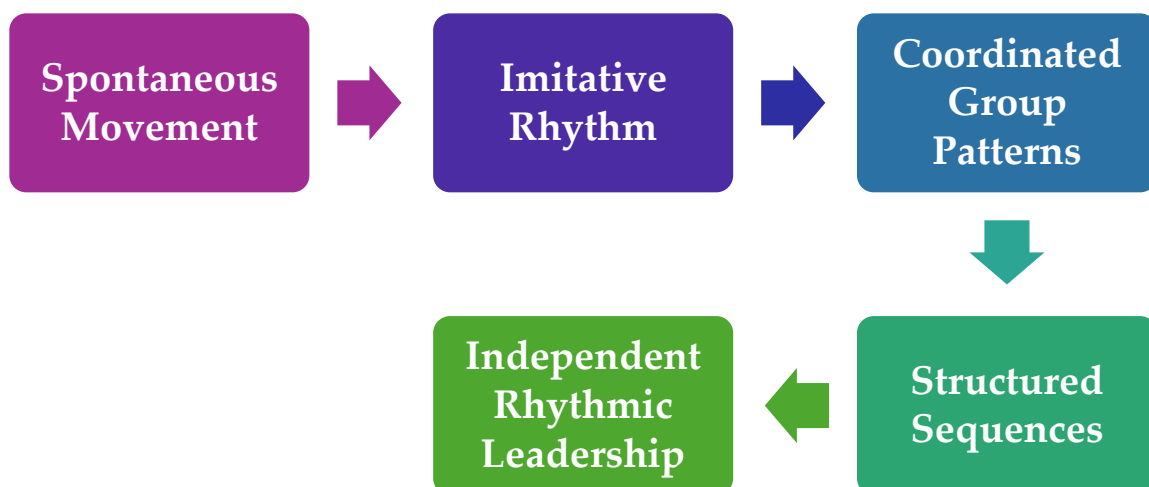


Figure 10. Developmental Progression in Rhythmic-Movement Activities (Ages 2–7)

Table 18 and Figure 10 illustrate how rhythmic-motor engagement evolves from spontaneous sensory exploration to intentional coordination and leadership. Early rhythmic responses are primarily sensorimotor and imitative. As development progresses, children demonstrate increasing timing precision, memory for sequences, and the ability to synchronise with peers.

Research suggests that rhythmic synchronisation enhances attention and executive control (Gordon et al., 2015). Group movement further supports social bonding and emotional regulation, contributing to an inclusive classroom climate (Phillips-Silver & Keller, 2012). In the Czech preschool framework (MŠMT, 2021), rhythmic activities are often integrated into daily rituals, transitions, and seasonal celebrations. Within ABT, these moments become structured learning opportunities that simultaneously develop motor, linguistic, and socio-emotional competencies.

Practical Implications for Teachers:

- Integrate rhythm into daily transitions and routines.
- Use repetition and predictability to support regulation.
- Combine movement with language (songs, rhymes, syllable clapping).
- Encourage peer leadership in later stages.
- Adapt tempo and complexity to developmental level.

Commentary on Key Takeaways – Rhythmic-Movement Activities in ABT, The Key Takeaways table synthesises the central developmental and pedagogical principles underlying rhythmic-movement activities within the Activity-Based Teaching framework. As outlined, rhythmic engagement functions as an embodied bridge between motor coordination, cognitive structuring, language development, and emotional regulation. The table highlights that rhythm is not an isolated artistic element but a developmental organiser supporting executive functions, phonological

awareness, and social synchronisation (Gordon et al., 2015; Phillips-Silver & Keller, 2012).

Table 19

Key Takeaways: Rhythmic-Movement Activities

Core Principle	Key Insight
1. Embodied Learning	Movement supports cognitive processing.
2. Rhythm and Language	Rhythmic patterns strengthen phonological awareness.
3. Self-Regulation	Synchronisation enhances emotional control.
4. Inclusion	Structured rhythm supports participation of diverse learners.
5. Gradual Independence	Leadership emerges through guided practice.

Importantly, the summary underscores the role of intentional scaffolding and gradual independence. Structured rhythmic repetition fosters predictability and security in early stages, while leadership opportunities in later stages promote autonomy and collaborative competence (Vygotsky, 1978; Rogoff, 2003).

Within ABT, rhythmic-movement activities therefore represent an integrative pedagogical strategy that simultaneously strengthens cognitive readiness, social inclusion, and self-regulation. The key insights confirm that movement-based learning is developmentally grounded, theoretically supported, and highly adaptable to inclusive early childhood environments (NAEYC, 2020).

4.7 MODULE 5, ASSOCIATIVE LEARNING

Associative Learning refers to the process by which children form connections between stimuli, actions, and consequences. In early childhood (ages 2–7), associative mechanisms play a fundamental role in habit formation, language acquisition, emotional responses, and early academic learning. Within the Activity-Based Teaching (ABT) framework, associative learning is not reduced to mechanical conditioning; rather, it is embedded in meaningful, socially mediated activities that connect experience with understanding.

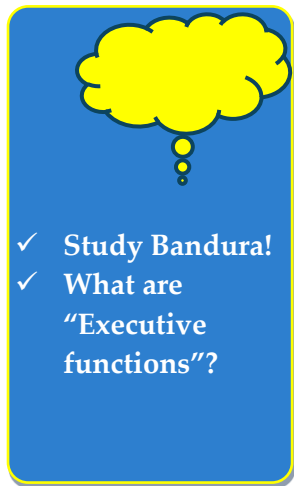
Children constantly form associations between actions and outcomes ("If I share, we continue playing"), words and objects, symbols and meanings, and routines and expectations. When intentionally structured, these associations become powerful tools for supporting behavioural regulation, conceptual development, and classroom predictability (Bandura, 1977; Illeris, 2018).

Executive function development significantly mediates the relationship between structured activity and later academic outcomes (Raver et al., 2018).

In the Czech preschool context, consistent routines, ritualised transitions, and thematic integration strongly support associative learning processes (MŠMT, 2021). ABT enhances this natural mechanism by ensuring that associations are formed within purposeful, reflective, and socially interactive contexts.

4.7.1 Associative Learning: Theoretical Background

Associative learning is grounded in three major theoretical traditions: (i) Behaviorist foundation, (ii) Social learning theory, (iii) Cognitive and constructive perspectives.



**REMEMBER**

1. Behaviorist Foundations
2. Social Learning Theory
3. Cognitive and Constructivist Perspectives

Firstly, classical conditioning (Pavlov) and operant conditioning (Skinner) describe how behaviours become linked to stimuli and consequences. In early childhood education, reinforcement, repetition, and predictable consequences shape adaptive behaviours. However, modern pedagogical approaches move beyond simple stimulus–response models. Reinforcement is most effective when embedded in meaningful social interaction rather than isolated reward systems (Illeris, 2018).

Secondly, Bandura (1977) expanded the concept of associative learning by emphasising observational learning and cognitive mediation.

Children do not merely respond to reinforcement; they observe models, anticipate outcomes, and internalise patterns of behaviour. In classroom contexts, associative learning involves linking observed social behaviours with perceived consequences.

Within ABT, modelling, guided participation, and peer interaction strengthen these associative processes. Vygotsky's (1978) sociocultural theory further emphasises that associations are mediated by language and social interaction. Meaning emerges not only from repetition but from shared dialogue and reflection.

Thirdly, from a cognitive standpoint, associative learning supports schema formation. Children connect prior experiences with new information, gradually organising knowledge into meaningful structures (Illeris, 2018). Repeated thematic activities, predictable routines, and structured transitions help solidify conceptual associations.

4.7.2 Associative Learning: Developmental Characteristics

Associative learning develops progressively across early childhood as children move from immediate sensory connections toward cognitively mediated and socially regulated associations. In the toddler years, learning is primarily grounded in direct cause–and–effect experiences embedded in sensorimotor exploration. Repetition and

immediate feedback play a crucial role in stabilising behavioural patterns and forming early expectations about the environment.

Between ages three and five, associative processes become increasingly intertwined with language development and symbolic thinking. Children begin linking words to actions, rules to social approval, and routines to anticipated outcomes. These emerging cognitive capacities allow associations to extend beyond immediate reinforcement and incorporate verbal explanation, imitation, and shared reflection (Bandura, 1977; Vygotsky, 1978).

By ages five to seven, associative learning becomes more flexible and transferable. Children can understand conditional reasoning ("if-then" structures), delay gratification, and apply previously learned associations across contexts. At this stage, executive functions and metacognitive awareness support the internalisation of rules and social norms (Illeris, 2018).

From an Activity-Based Teaching perspective, it is therefore essential that associative experiences evolve alongside developmental capacities. While younger children benefit from consistent routines and clear consequences, older preschoolers and early school-aged children require opportunities for discussion, reasoning, and generalisation. The following table summarises the developmental characteristics of associative learning across ages 2–7 and outlines their pedagogical implications within ABT.

Table 20

Developmental Characteristics of Associative Learning in Early Childhood:
Development progresses from immediate sensory associations toward abstract rule-based and transferable connections

Age	Typical Patterns	Associative	Cognitive & Emotional Processes	ABT Implications
2–3 years	Simple effect links ("push → sound")	cause-and–	Sensorimotor learning; immediate reinforcement	Use clear, consistent consequences; repeat routines

3–4 years	Associating words with objects and actions	Language expansion; symbolic representation	Integrate naming, gestures, and repetition
4–5 years	Linking actions with social outcomes	Emerging moral awareness; internalisation	Use collaborative tasks to reinforce prosocial behaviour
5–6 years	Understanding conditional rules ("if–then")	Growing logical reasoning; delayed gratification	Introduce structured games with predictable rules
6–7 years	Applying learned associations across contexts	Transfer of learning; self-regulation	Encourage reflection and generalisation

Table 20 demonstrates that associative learning evolves from direct cause–and–effect experiences to increasingly abstract and transferable patterns. In the early stages, consistency and repetition are essential for stabilising expectations. As children mature, associations become cognitively mediated, incorporating language, reasoning, and social understanding (Bandura, 1977; Illeris, 2018). Within ABT, structured routines and meaningful activity contexts ensure that associations are developmentally constructive rather than mechanical.

4.7.3 Practical Implications for Teachers: Associative Learning in Practice ABT Scenario

Use ABT Scenario in your practice.

Associative learning can be embedded within everyday classroom activities

Translating associative learning theory into classroom practice requires intentionally structuring experiences in which children can clearly perceive connections among actions, consequences, and meanings.

Within the Activity-Based Teaching (ABT) framework, teachers move beyond simple reward-based reinforcement and instead design activities that integrate modelling, dialogue, reflection, and consistent routines. Practical implications, therefore, emerge directly from

developmental principles: younger children require repetition and immediate

Associative learning

Children understand *why* outcomes occur, not *that* they occur.

feedback, whereas older preschoolers benefit from guided reasoning and opportunities to generalise learned associations. The following ABT scenario illustrates how associative learning can be embedded in everyday classroom activities to support self-regulation, social understanding, and cognitive transfer.

Associative learning is most developmentally beneficial when children understand *why* outcomes occur, not merely *that* they occur.

Table 21

Example Activity: "If-T hen Learning Paths"

Objective:

Support rule understanding, behavioural self-regulation, and logical reasoning.

This scenario connects behaviour, consequence, and reflection—strengthening internalised understanding rather than external compliance.

Activity Structure:

1. Scenario Presentation:

The teacher introduces a simple conditional situation:

"If we clean up together, then we have extra story time."

2. Action Phase:

Children collaboratively complete the task.

3. Outcome Experience:

A positive consequence follows immediately.

4. Reflection:

"What happened when we worked together?"

"Why did we get extra time?"

Teacher's Role:

- Use natural consequences rather than excessive external rewards.
 - Maintain predictable daily routines
 - Encourage transfer of learning
 - Gradually shift external reinforcement into intrinsic motivation
 - Pair verbal explanations with action to strengthen cognitive mediation.
 - Encourage reflection to promote transfer of learning.
-

Table 21 illustrates how associative learning can be operationalised within the Activity-Based Teaching (ABT) framework through structured yet developmentally appropriate classroom interaction. The "If-Then Learning Paths" activity exemplifies the transition from externally guided behavioural regulation to a cognitively mediated understanding of rules and consequences.

The scenario is intentionally designed around a conditional structure ("if-then"), which supports the development of logical reasoning in children aged 4–6. At this developmental stage, children begin to grasp simple contingency relationships and can anticipate outcomes based on shared agreements. By collaboratively completing the task, children experience the direct connection between collective behaviour and a positive outcome, reinforcing both social responsibility and rule comprehension.

A key strength of the activity lies in the reflection phase. Rather than allowing the consequence to function solely as reinforcement, the teacher facilitates verbal processing of the experience. This reflective dialogue promotes internalisation of the rule structure and supports transfer of learning beyond the immediate situation.

Over time, such guided reflection reduces dependence on external rewards and fosters intrinsic motivation and self-regulation.

Importantly, the teacher's role remains intentional but gradually less directive. Through predictable routines, natural consequences, and encouragement of generalisation, the activity moves beyond compliance-based behaviour management and instead strengthens children's capacity to understand, anticipate, and independently regulate their actions. Thus, Table 21 demonstrates that associative learning in ABT is not limited to conditioning mechanisms; it represents a structured pathway toward autonomy, logical reasoning, and socially grounded self-regulation.

4.7.4 Key Takeaways – Associative Learning in ABT

The Key Takeaways summarise associative learning as a foundational mechanism that evolves from simple cause-and-effect connections to cognitively mediated, transferable rule-based understanding. Within the Activity-Based Teaching framework, meaningful routines, social modelling, and guided reflection transform external reinforcement into internalised self-regulation. The synthesis emphasises that, when intentionally structured, associative learning supports autonomy, logical reasoning, and socially responsible behaviour rather than mere behavioural compliance.

Table 22 synthesises associative learning as a dynamic developmental mechanism embedded within meaningful activity. Rather than relying solely on reinforcement, ABT integrates social modelling, language mediation, and reflective dialogue to ensure that associations foster autonomy, self-regulation, and conceptual understanding (Bandura, 1977; Vygotsky, 1978).

Table 22

Key Takeaways: Associative Learning in Activity-Based Teaching

Core Principle	Key Insight
1. Foundation of Learning	Early learning is built on forming meaningful connections.
2. Beyond Conditioning	Social and cognitive mediation enrich associations.
3. Importance of Consistency	Predictable routines strengthen internalisation.
4. Reflection and Transfer	Discussion supports the generalisation of rules.
5. Developmental Progression	Associations move from immediate to abstract reasoning.

4.8 SUMMARY

This unit presented Activity-Based Teaching (ABT) as a comprehensive pedagogical framework for early childhood education (ages 2–7), grounded in developmental psychology, constructivist theory, and sociocultural learning principles. The introductory section established ABT as an approach that integrates cognitive, social, emotional, and motor development through structured, meaningful activities. Rather than separating domains of learning, ABT emphasises experiential engagement, guided participation, and reflective dialogue as interconnected processes that support holistic child development.

The first submodule focused on cooperative play as a socially mediated learning process. Cooperative activities enable children to negotiate roles, share responsibility, and develop perspective-taking skills. Theoretical foundations highlighted the importance of scaffolding and peer interaction in promoting social competence and executive functioning. Practical ABT scenarios demonstrated how structured group tasks can strengthen collaboration, communication, and emerging moral reasoning.

The second submodule explored rhythmic-movement activities as embodied learning experiences. Drawing on developmental and neuropsychological perspectives, the content emphasised rhythm as a regulatory and organisational tool supporting motor coordination, language acquisition, emotional regulation, and social synchronisation. Developmental characteristics across ages 2–7 illustrated how rhythmic engagement evolves from simple repetition to structured, rule-based movement patterns. Within ABT, rhythmic activities were shown to foster both individual self-regulation and collective participation through predictable, scaffolded experiences.

The final submodule addressed associative learning as a foundational mechanism underlying early learning processes. Moving beyond behaviourist

conditioning, the unit framed associative learning as a cognitively and socially mediated process through which children connect actions, consequences, symbols, and meanings. Developmental progression was described from immediate cause-and-effect experiences in toddlerhood to conditional reasoning and transfer of learning in early school age. The ABT scenarios illustrated how intentional structuring of routines, reflection, and natural consequences supports internalisation of rules and the gradual shift from external reinforcement to intrinsic motivation.

Across all submodules, a common pedagogical thread emerged: learning is most effective when embedded in meaningful activity, supported by consistent structure, and mediated through social interaction. Teachers play a crucial role in designing environments that balance predictability with flexibility, guidance with autonomy, and repetition with reflection. The ABT framework, therefore, positions the educator not merely as a transmitter of knowledge but as a facilitator of developmental progression.

In conclusion, ABT represents an integrative approach that aligns theoretical foundations with practical classroom application. By combining cooperative interaction, rhythmic-movement engagement, and associative learning processes, ABT provides a developmentally responsive model that supports self-regulation, logical reasoning, social competence, and intrinsic motivation in early childhood education.

4.9 PROBLEMS

1. Which principle best characterises Activity-Based Teaching (ABT) in early childhood education?
 - a) Teacher-directed transmission of factual knowledge
 - b) Isolated skill training separated by subject areas
 - c) Learning through structured, meaningful activity and reflection
 - d) Early academic acceleration through worksheets
 - e) Strict behavioural conditioning without dialogue
2. In ABT, the role of the teacher is primarily to:
 - a) Control all aspects of children's activity
 - b) Provide continuous external rewards
 - c) Facilitate, scaffold, and structure meaningful learning experiences
 - d) Eliminate peer interaction to avoid conflict
 - e) Focus exclusively on measurable cognitive outcomes
3. Experiential learning in early childhood is best described as:
 - a) Memorisation through repetition
 - b) A cycle connecting experience, reflection, and application
 - c) Passive observation of adult demonstrations
 - d) Independent seatwork with minimal guidance
 - e) Testing prior to hands-on exploration
4. Imitation in early childhood contributes most directly to:
 - a) Mechanical copying without understanding
 - b) Social learning, internalisation of norms, and skill acquisition
 - c) Avoidance of peer interaction
 - d) Elimination of adult modelling
 - e) Replacement of verbal communication

5. Cooperative play primarily supports the development of:
 - a) Perspective-taking, negotiation, and shared responsibility
 - b) Individual competition and comparison
 - c) Isolated cognitive problem solving
 - d) Teacher-centred instruction
 - e) Passive rule memorisation
6. In ABT, rhythmic-movement activities should not be understood as:
 - a) Tools for supporting motor coordination
 - b) Means of enhancing emotional regulation
 - c) Opportunities for social synchronisation
 - d) Isolated entertainment without developmental value
 - e) Supports for phonological awareness
7. Rhythmic-movement activities contribute to language development mainly by:
 - a) Replacing verbal instruction
 - b) Strengthening phonological awareness through patterned repetition
 - c) Limiting expressive communication
 - d) Reducing group participation
 - e) Eliminating structured routines
8. Associative learning in children aged 2–7 progresses from:
 - a) Abstract logical deduction to sensory exploration
 - b) Immediate cause–and–effect connections to conditional reasoning and transfer
 - c) Independent moral judgment to external reinforcement
 - d) Rule rejection to spontaneous autonomy
 - e) Passive imitation to cognitive isolation
9. The reflection phase in associative learning scenarios primarily serves to:
 - a) Strengthen internalisation and transfer of understanding
 - b) Increase dependence on rewards
 - c) Replace structured routines

- d) Eliminate teacher guidance
 - e) Reduce collaborative engagement
10. Associative learning within ABT is not limited to:
- a) Behaviourist stimulus–response conditioning
 - b) Social modelling and dialogue
 - c) Guided reflection
 - d) Cognitive mediation
 - e) Transfer across contexts

Answer Key

1.c, 2.c, 3.b, 4.b, 5. a, 6.d., 7.b, 8.b, 9.a, 10.a

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Activity Schedule



CONTENTS

- Introduction
- Visual Activity Schedules
- Activity Schedules with Digital Devices/Tools
- Mechanism of Activity Schedules
- Teaching Following Activity Schedule
- Implementation of the Activity Schedules



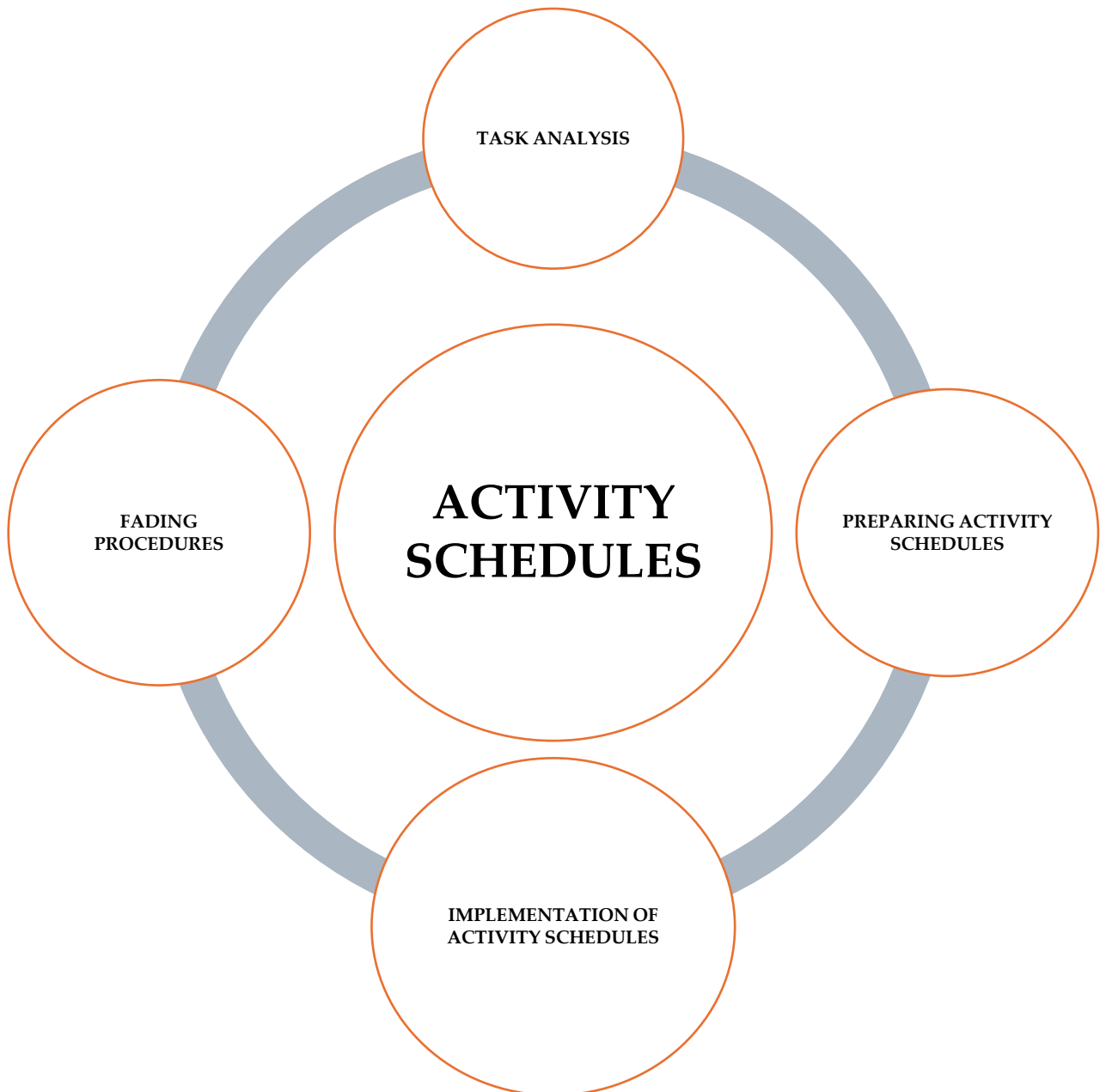
LEARNING OUTCOMES

- After studying this unit;
- Describe the Activity Schedules
- Explain the Mechanism of Activity Schedules
- Identify Following of the Activity Schedules
- Analyze Implementation Steps of the Activity Schedules



THE SPECIAL EDUCATION ACTIVITIES BOOK FOR CAREGIVERS

Bekir Fatih
Meral, Ph.D.



5 ACTIVITY SCHEDULES

5.1 INTRODUCTION

An activity schedule includes a range of visual cues, such as drawings, photographs, and written text, to teach skills and ensure that tasks progress in a sequential manner (McClannahan & Krantz, 1999). Activity schedules, at least in the next phase, are based primarily on self-monitoring procedures with little or no parental or practitioner support; thus, visual cues serve as antecedent warnings indicating which behaviors to exhibit and which not to exhibit.

Although activity schedules can also be used to follow routines, they are more useful and efficient for teaching complex skills through a chain of behaviors (e.g., dressing, brushing teeth, applying makeup) because they make it easier for students to follow each step in the chain (Mechling et al., 2009). Activity schedules can also be used to teach community skills, such as checking out a library book, crossing the street, purchasing groceries, or purchasing at a community-based bakery, which may help individuals with SEN and autism perform better in the community and thereby improve their quality of life (Cheung et al., 2016).

Activity schedules that are consistent with self-monitoring procedures basically aim to improve self-management competencies of individuals with SEN, including children with autism, by teaching behavior chains, such as daily living, play, or vocational skills. (Cheung et al., 2016).



Activity schedules are more effective in teaching complex skills through a chain of behaviors such as daily living or self-care skills

5.2 VISUAL ACTIVITY SCHEDULES



Visual activity schedules include visual cues depicted in pictures or in didactic words/sentences showing sequence of the behavior.

Completing daily living skills independently is essential for maintaining independence throughout the lifespan. Visual activity schedules are one way to teach sequences of behavior, such as getting dressed, packing a backpack for school or another destination, cooking, and changing bed sheets (Tereshko, 2026). Visual activity schedules include visual cues depicted in pictures or in didactic words/sentences that depict the relevant sequence of the behavior. The activity schedules aim, philosophically, to help individuals become more independent of others (parents or caregivers) by taking on their own daily responsibilities. For example, when teaching how to make instant soup, an activity schedule can be used to visualize the steps, which include a picture showing adding 4 or 5 cups of cold water, then mixing in a packet of instant soup, and waiting 10 minutes until it's completely ready to consume. Each picture signals to the individuals what they should do in sequence until they complete the task. This visual activity schedule could be posted on the oven or somewhere in the kitchen.

Visual activity schedules, which are one of the evidence-based practices, consist of three strategies: antecedent interventions, prompting, and visual supports (Hume et al., 2021). Antecedent interventions are used to remind individuals with special educational needs of what they need to do when visual cues/clues showing relevant steps in ongoing skills, such as brushing teeth or putting on a coat, are presented. Visual activity schedules also prompt or support individuals who need external motivation, especially children with autism, by initiating and maintaining behavior. The availability of activity schedules also increases the likelihood of completing tasks. Using activity schedules is not limited to chaining skills; they also involve a variety of tasks throughout the day, such as completing lists, using daily planners, and following written directions (Tereshko, 2026).



The key problem about children with special educational needs or autism is to be dependent on others, including parents, practitioners or caregivers during the activities.

Given that children with special educational needs, especially children with autism, may be dependent on others, such as parents, specialists, or teachers, activity schedules are particularly helpful in enabling these children to become more independent from others by supporting their self-determination or autonomy. The prompt dependency on another person is often observed in individuals with special educational needs, especially those with autism (Koyama & Wang, 2011). On the other hand, using visual activity schedules as visual cues can reduce an individual's need to rely on others and improve self-direction when completing tasks.

Visual activity schedules can be generated in many forms (Koyama & Wang, 2011). Visual cues indicating how to perform a relevant step or a chain of behavior can be depicted in a small booklet (one picture per page). In addition, visual activity schedules can be presented using pictures or videos on tablets or other electronic devices (Hugh et al., 2018).

Numerous studies have demonstrated the effectiveness and adequacy of activity schedules for teaching a variety of skills through individualized instruction. Two important studies stand out among these. First, the use of visual activity schedules has been shown to be effective in teaching individuals with special needs, particularly those with autism, to successfully complete medical examinations (Chebuhar et al., 2013). Second, the implementation of visual cues and a video-based activity schedule by using a digital device (a tablet) improved the shopping skills of a young adult with autism in a community setting/a grocery store (Burckley et al., 2015).

5.3 ACTIVITY SCHEDULES WITH DIGITAL DEVICES/ TOOLS

Today, teaching various skills, especially community or social skills, using activity schedules on technological devices, including tablets, smartphones, and smartwatches, is increasingly accepted as a way to prevent stigma and enhance teaching capacity through high-tech digital tools. No doubt, creating a digital self-managed activity schedule is a new way to use activity schedules, rather than in conventional ways (e.g., photographs and written words). These high-tech strategies involve using digital tools, such as iPads or iPhones, to create activity schedules for teaching behavioral chains (Cheung et al., 2016). These new-generation tools are called personal digital assistants (PDAs) and are portable self-prompting devices designed to increase the independence of students with special educational needs and autism (Mechling et al., 2009).

5.4 MECHANISM OF ACTIVITY SCHEDULES



Stimulus control, cue/cue, and cue/cue dependency are the three fundamental pillars of the activity schedules mechanism.

Applied behavior analysis (ABA) offers a very broad repertoire of evidence-based practices. One of these is activity schedules. Activity schedules aim to teach various skills with its mechanism/principles to students with special educational needs, especially autism. This mechanism/principle(s) stands on some pillar:

5.4.1 Stimulus Control

The systematic effect of a pre-behavioral target stimulus on eliciting the target behavior is called "stimulus control". In another definition, if the frequency of the target behavior occurring in the presence of the target stimulus is higher than when no cue is used, the behavior is under "stimulus control" (Birkan, 2013). Stimulus control is achieved through the presence of visual cues (photographs

or words) on activity schedules that demonstrate or introduce how each step of the target behavior is performed. When the student exhibits the same or similar appropriate behavior each time they see the visual cue, this means they are under stimulus control. If a student is performing under stimulus control, this means they no longer need guidance from anyone (e.g., teacher, parent, caregiver) or require less support while performing their tasks and are more independent.

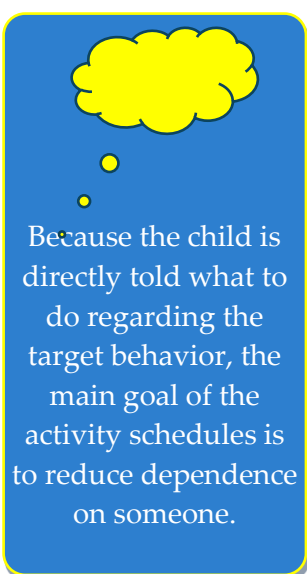
5.4.2 Cue/clue (Visual or Word)

A cue/clue, also known as a discriminative stimulus, is presented to help increase the frequency of occurrence of the target behavior. When teaching a new behavior, cues/clues (helpful stimuli) are generally used to increase the frequency of the behavior that occurs in the presence of the stimulus that ultimately controls the behavior or the discriminative stimulus (Birkan, 2013). In an activity schedule, a cue refers to a visual/photographic prompt showing how to perform the target behavior, or a written word that directs/instructs the target behavior. When using activity programs, other cues such as verbal guidance, modeling, and expecting looking can also be applied.

5.4.3 Cue/Clue Dependency

The development of individuals with SEN or autism is frequently hampered by cue/clue dependence. Cue/clue dependence occurs when the transfer of behavioral control from cue to appropriate environmental stimuli fails. This means that stimulus control fails significantly in transferring from verbal cues or gestures to environmental stimuli (Birkan, 2013). Second issue is “someone dependency” such as dependent on a practitioner or a parent. Children with special educational needs or autism might be over dependent on someone when doing tasks. Activity

schedules primarily aim to reduce dependence on someone by using these programs,



because an activity schedule shows or explains to the child what to do for each step of the target behavior. The next step is to reduce visual or written/word cues and allow the child to act independently without any person or schedule.

5.5 TEACHING FOLLOWING ACTIVITY SCHEDULE



The stages of cueing phase are manual guidance, the cue/clue withdrawal phase uses gradual assistance, spatial retreat, shadowing, and increasing distance.

The skill of following an activity schedule is taught through cueing or providing a clue and cue/clue withdrawal. The cueing phase involves manual guidance, the cue/clue withdrawal phase uses gradual assistance, spatial retreat, shadowing, and increasing distance (Birkan, 2013).

5.5.1 Manual Guidance

The ability to follow an activity schedule is taught through manual guidance. In manual guidance, the educator or adult guides the child by holding the child's hand, guiding them to point to a photographic or written cue, pick up their material, complete the activity, put away their material, and return to their schedule.

Manual guidance is an errorless teaching method and is always applied from behind the child. While manual guidance does not prevent all errors, it minimizes the possibility of errors. (Minimizing the possibility of errors is very important because if errors occur, some children learn to repeat the mistake, and as a result, teaching the correct responses can take a very long time.)

5.5.2 Withdrawing the Cue/Clue

As the child's competence increases, the adult gradually withdraws the manual guidance using assistance. Even if the supporting adult's hands are still on top of the child's hands or on the child's shoulders, this assistance is at a lower level. This

method generally provides parents and teachers with very useful information. Based on the child's hand, arm, and body movements, the adult can quickly decide whether the child will respond correctly or incorrectly in the next step and prevent the child from making mistakes by providing guidance or supporting the child in performing the activity independently with less assistance by allowing the child to make correct responses.

When children can perform the steps of chart-following skills with minimal assistance, the adult should use *spatial fading/ withdrawal*. That is, initially, light touches are made on the top of the child's hand, then after a while, they slide back from the child's hand to their wrist, then to the forearm or elbow, and finally to their shoulder or back.

However, if an error occurs, the adult should return to the previous cue/clue (*gradual instruction/ teaching*) and continue until the child responds correctly to the cue several times. Gradual instruction/teaching is an errorless and time-delay strategy that refers to enabling practitioners to provide cue/clues (immediate prompts) with instantaneous/momentary decisions based on the child's performance and ensuring correct responses during instructional skills.

Spatial fading/withdrawal is followed by *shadowing*. At this stage, the hands of the person offering the cue/clue follow the child's

movements but do not touch them. Initially, the adult may shadow a few centimeters away from the child; if the child's responses are correct, the distance is gradually increased.

If the child does not make a mistake when the adult is shadowing, it is time to *decrease proximity* (increase the distance). For very young children, this means the adult gradually moves a meter away, then a little further away. For some children, it may be possible to increase the distance by having the person offering the cue/clue



Gradual instruction is an errorless and time-delay strategy that refers to enabling practitioners to provide momentary and differentiated cue/clues during the intervention.

wait in the other corner of the activity area, at the door, or somewhere else where they are not visible.

The gradual use of cues/clues, progressing from progressive assistance to spatial fading/withdrawal, then to shadowing, and finally to decreasing proximity/increasing distance, is called teaching with cueing and cueing withdrawal, or teaching with decreasing cueing.



The goal of withdrawing the cues/clues is to allow the child to follow the activity schedule independently.

Carefully conducted teaching with cueing and cueing withdrawal allows the child to independently follow the activity schedule. However, when the child makes a mistake, the adult should immediately return to the previous cueing stage. If the child makes a mistake in the shadowing stage, the adult should return to the spatial withdrawal stage. If the child makes a mistake while the adult is using spatial withdrawal, they should

return to progressive assistance. Also, if the mistake occurs in the progressive assistance stage, the adult should return to the manual guidance stage. This prevents further mistakes and increases the child's chances of earning a reward in their next responses.

5.6 IMPLEMENTATION OF THE ACTIVITY SCHEDULES

5.6.1 Task analysis

Task analysis is important not only for activity programs but also for chaining behavior instruction, as it involves breaking long-term goals into smaller, short-term goals. Performing task analysis will increase the independence of children and individuals with special educational needs as the steps become smaller, more observable, and easier to teach. Task analysis can be performed either by hypothetically writing down each step of the target behavior or by practically performing the task and writing down each step of the task or chain of behavior.

5.6.2 Preparing activity schedules



In line with the task analysis, activity schedules can be prepared using real/tangible materials or a digital device/tool.

Activity schedules can be prepared in photo, image, or written form.

Activity schedules provide clues to help individuals attend to the activity and pursue the task by promoting visual cues (Eyiip et al., 2018).

Preparing activity schedules involves placing visual cues/clues/signs/prompts (photos, pictures, or words/phrases) on the board using real materials or a digital device/tool (smartphone or tablet), in accordance with the task analysis.

5.6.3 Implication/ Intervention

Interventions using activity schedules are mostly carried out in accordance with the principles of gradual instruction/teaching. Visual cues/signs (photos, pictures, or words/sentences) in the activity schedule draw the child's attention to the task and show the child how to do it. During this time, the practitioner or caregiver supports/guides the child with special educational needs or autism based on their spontaneous/instant decisions, depending on the child's performance. The practitioner or caregiver can use hierarchical or differentiated intensity support, from full physical support to expectant looking, during the intervention.

5.6.4 Fading procedure

The fading procedure involves gradually reducing the caregiver's support, prompting, or guidance and allowing the child with special educational needs or



In the final stage, the practitioner or caregiver should increase their closeness with the child so that the child can complete the task independently.

autism to perform tasks independently, using only activity schedules.

The practitioner or caregiver observes the child's performance, gradually reduces assistance or withdraws cues/clues/prompts, and just shadows the child's hand without touching when standing near or behind him/her.

Next, the practitioner or caregiver reduces closeness by increasing proximity with the child so the child can complete the task independently, using only the activity schedule, without anyone's assistance.

All components of activity schedule are shown in Table 23.

Table 23

Components of Activity Schedule

Domain	Key Objective	Technical Description / Methodology	Evidence-Based Rationale
1. Task Analysis	Deconstruction of Skills	Breaking a "behavior chain" (e.g., recipe, hygiene) into discrete, observable, and measurable steps.	Prevents "expert blindness" and ensures the individual is not overwhelmed by the complexity of the task.
2. Preparing Schedules	Stimulus Design	Selecting age-appropriate visuals (photos/icons), balancing preferred and non-preferred tasks (Premack Principle), and choosing the platform (Digital vs. Binder).	Digital platforms (like Google Slides) increase social validity and portability while reducing the weight of physical materials.

Domain	Key Objective	Technical Description / Methodology	Evidence-Based Rationale
3. Implementation	Fostering Independence	Using "Manual Guidance" (from behind) and "Errorless Learning" to guide the individual through the steps without verbal commands.	Avoiding verbal prompts prevents "prompt dependency," ensuring the individual responds to the schedule, not the teacher.
4. Fading Procedures	Transfer of Control	Systematically withdrawing physical contact (Graduated Guidance) and increasing spatial distance between the teacher and the student.	The ultimate goal is for the behavior to be maintained by natural reinforcers and the visual schedule alone.

5.7 SUMMARY

Activity schedules are evidence-based visual support systems designed to help individuals with developmental disabilities complete sequences of tasks independently. By shifting the source of control from a human instructor to a set of visual or written stimuli, these schedules address one of the core challenges in special education: prompt dependency.

Preparation of activity schedules involves selecting the appropriate medium and symbols. While traditional schedules utilized physical binders with static photos, contemporary research highlights the benefits of Digital Activity Schedules using tools like Google Slides or PDAs. Digital formats offer higher "social validity" as they resemble everyday technology used by neurotypical peers, thereby reducing social stigmatization in community settings. Key preparatory steps include assessing whether the user requires photographs, line drawings, or text, and ensuring a balance between preferred and non-preferred activities to maintain "behavioral momentum."

Implementation focuses on errorless learning through "manual guidance" (physical prompting from behind). Educators are encouraged to avoid verbal prompts entirely during the training phase. Verbal instructions often become a "crutch," where the learner waits for a voice rather than reacting to the visual schedule. By using graduated guidance, the practitioner ensures the learner completes the chain successfully from the start, reinforcing the habit of following the schedule rather than the teacher. The final stage is the systematic fading of prompts and reinforcers. This includes "spatial fading," where the instructor gradually moves further away from the learner, and "stimulus fading," where the prominence of the visual icons is reduced. The goal is to transition the learner to natural reinforcers—for instance, the reward for a "snack making" schedule should ideally be the enjoyment of eating the snack itself, rather than an external token.

In summary, activity schedules are one of the most powerful evidence-based practices used to achieve the "least restrictive environment" goal in special education. The success of this method lies in a combination of rigorous task analysis, a disciplined damping-off process, and technological integration tailored to the individual's needs.

5.8 PROBLEMS

1. What is the primary purpose of breaking down a complex skill into smaller steps during the task analysis process?
 - a) To increase the use of verbal prompts.
 - b) To maximize the probability of the individual making errors.
 - c) To reduce the cost of activity schedule materials.
 - d) To prolong the intervention time of the practitioner.
 - e) To ensure the individual can complete each step independently.
2. In a task analysis created for a digital activity schedule (e.g., using Google Slides), what is the benefit of having each slide represent only one single step?
 - a) It increases focus by reducing visual clutter and distraction.
 - b) It preserves the battery life of the digital device.
 - c) It forces the individual to engage in more social interaction.
 - d) It makes the prompt fading process impossible.
 - e) It is only suitable for high-functioning individuals.
3. Which of the following is the best example of a "behavior chain" suitable for task analysis?
 - a) Watching television.
 - b) Waiting in line.
 - c) Saying one's name.
 - d) Brushing teeth.
 - e) Smiling.
4. In the context of schedule preparation, what does it mean for visuals (photos or symbols) to be "at the individual's level"?
 - a) The individual must possess picture-to-object matching skills.
 - b) The visuals must always be in full color.
 - c) Only stock images from the internet should be used.
 - d) The schedule must consist of at least 20 pages.

- e) Written instructions are more important than the pictures.
5. What is the primary advantage of using video modeling in digital activity schedules (e.g., on a smartphone or iPad)?
- a) It makes the device look more professional.
 - b) It demonstrates the behavior in a dynamic and fluid manner.
 - c) It allows parents to avoid interacting with the child.
 - d) It completely eliminates the need for auditory cues.
 - e) It is primarily used for playing games.
6. Why must the "beginning" and "end" points of selected activities be clearly defined?
- a) Because it is only necessary for the teacher to know.
 - b) To make the activities last longer.
 - c) To prevent material waste.
 - d) So the individual knows when the task is finished and can move to the next page.
 - e) To keep the individual constantly busy.
7. What is the core principle of using "manual guidance" (physical prompting from behind) when starting schedule training?
- a) To force the individual to work.
 - b) To increase the frequency of verbal prompts.
 - c) To look the individual in the face while giving commands.
 - d) To provide loud verbal motivation.
 - e) To ensure errorless learning and prevent the wrong respond.
8. What is the most important reason for an educator to avoid continuously "verbal prompting" during implementation on chain behavior?
- a) To prevent the teacher's voice from becoming strained.
 - b) To avoid disturbing other people in the environment.
 - c) To test the individual's hearing skills.
 - d) To prevent the individual from becoming prompt-dependent on the teacher.

- e) Because training must only occur in silent environments.
9. What is the most important reason why an educator would avoid occasionally using "food/snack reinforcers" during chaining behavior practice?
- a) To ensure the continuity/fluidity of an individual's behavior.
 - b) Because food reinforcers are too expensive to maintain in a long-term educational budget.
 - c) To prevent the individual from developing a biological dependence on sugar.
 - d) Because individuals with special educational needs or autism are generally not motivated by edible items.
 - e) To allow the educator more time to collect data without the student being distracted by eating.
10. What does increasing "spatial distance" (spatial fading) mean during the fading process?
- a) Moving the individual to a larger room.
 - b) Putting blank pages between the schedule activities.
 - c) The practitioner gradually moves further away from the individual.
 - d) Turning up the volume on the digital device.
 - e) Sending the individual home from the clinic.

Answer Key

1.e, 2.a, 3.d, 4.a, 5.b, 6.d., 7.e, 8.d, 9.a, 10.c

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Peer Tutoring



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- Introduction
- Module 1: Mutual Learning
- Module 2: The child as a teacher
- Module 3: Peer imitation
- Module 4: Social support
- Module 5: Motivation in pairs or in a small group



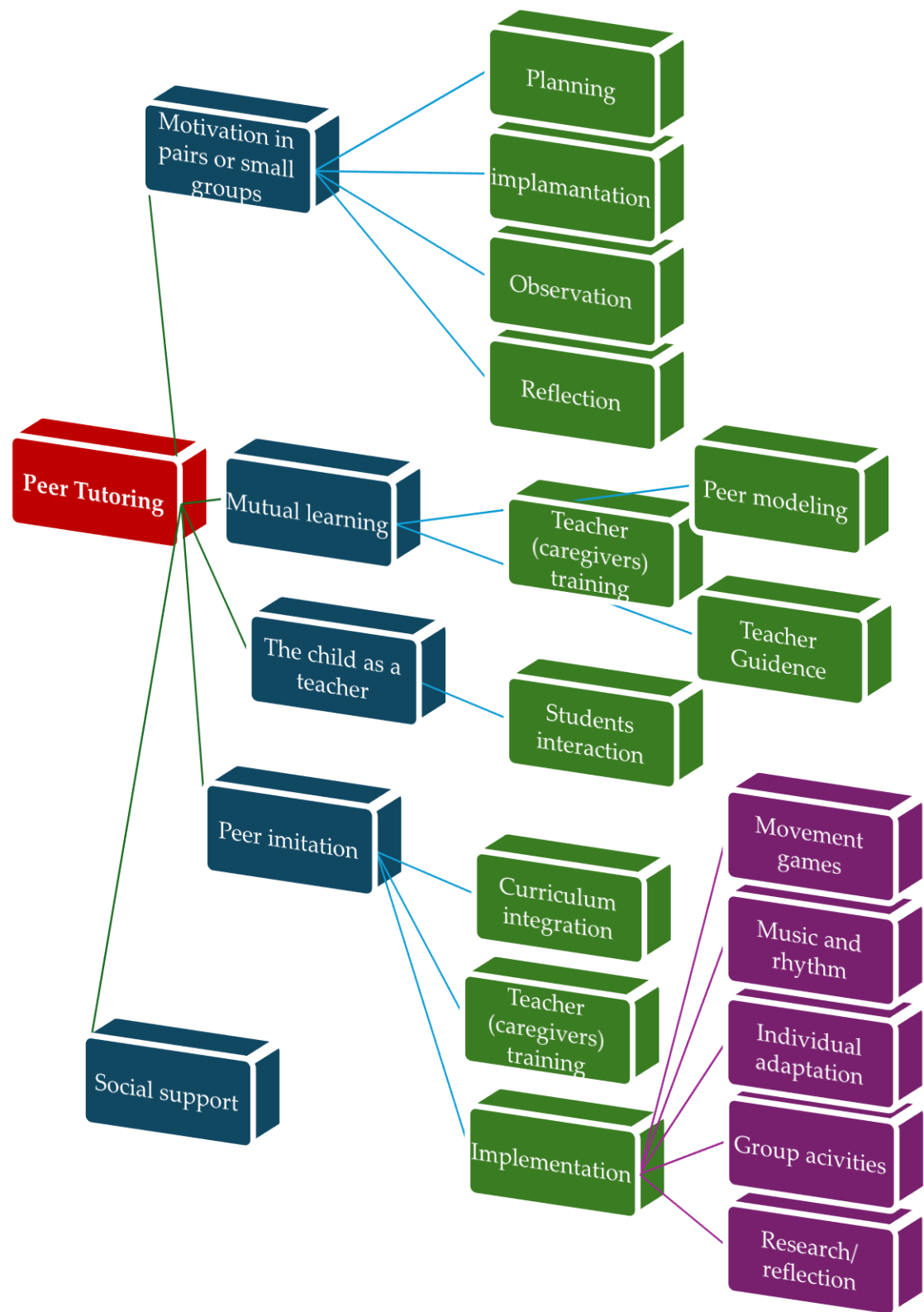
LEARNING OUTCOMES

- **After studying this unit, the reader will:**
 - Describe the principles of peer-based teaching.
 - Explain key peer-based learning approaches.
 - Identify learning opportunities in daily routines.
 - Analyze child engagement in activities.
 - Interpret the impact on inclusion and development.

THE SPECIAL EDUCATION COURSE BOOK FOR CAREGIVERS

Barbora Bazalová
Dana Zámečnicková
Veronika Včelíková

UNIT NO: 6



6 PEER TUTORING

6.1 INTRODUCTION

Peer tutoring is very important in planning children's development in early childhood. The period between the ages of 2 and 7 is one of the most important stages of development, when we can support children's comprehensive development in all areas—mental, social, and emotional.

This period is also a time of learning, which should be used to develop the child's skills. Children learn by imitation, and play, and gaming activities play an important role in the learning process, as they appear to be most suitable for child development. Experts recommend using everyday activities for learning and development. However, it is also important to apply modern approaches grounded in scientific knowledge to make children's development, especially that of disadvantaged children, more effective and thus develop their potential.

Activities with peers, mutual interaction, and imitation are part of everyday life. As mentioned in the introductory paragraph, it is important and necessary, at an early age, to use professional approaches that lead to improved mutual interaction not only among children but also between children and caregivers (social workers, teachers, parents). These activities function as a living environment in which children actively develop social understanding, recognise the world and the relationships within it, and regulate their emotions. Still, we always start from the child's needs and must consider their previous experiences and age. Peer interaction plays a key role in this process. Children are often more motivated and achieve development more easily when they cooperate with others than when they act alone. Here, we primarily draw on the theory of the zone of proximal development, which is supported by several professional theories.

Mutual learning can be considered one of the ways to help children orient themselves in learning and thus develop their learning in areas such as cooperation

(everyday activities such as playing together, cleaning, arranging the environment, joint performances). Gradually, children learn to transfer their acquired social experiences into the cognitive and emotional spheres. All these activities gradually contribute to development and bring benefits in the form of mutual functioning and involvement in joint activities.

If we look at this area comprehensively and theoretically, joint activities and peer contact play an irreplaceable role in social-cognitive and emotional development. Through mutual learning, sharing activities, and accompanying children through this stage of development, we promote empathy, social behaviour, consideration, and interaction. Along with this, the child develops communication skills and creates appropriate communication strategies. However, it is important to note that all these situations can be quite challenging for some children, who may struggle to cope. Even seemingly simple situations can be complex and difficult for children to understand, especially when it comes to understanding that other children may view the same situation differently and cope with it differently. Children learn mutual respect, how to resolve conflicts, experience success, and accept different roles. These are opportunities to develop emotional regulation and self-control through mutual interaction and guidance.

For children with social disadvantage, autism spectrum disorder (ASD), developmental delays, or physical and health-related disabilities, peer interaction may be less accessible or more demanding. These children may have fewer opportunities to engage in social play or may find communication and cooperation challenging. Peer tutoring offers a gentle, inclusive, and highly effective way to address these barriers. When learning is mediated through peers, children are often more motivated, attentive, and willing to participate. Peer-based learning reduces pressure, supports natural imitation, and creates meaningful opportunities for shared success.

All of the above-mentioned contexts highlight the importance of children's joint activities. Children create their own social space and become familiar with certain routines, rules, and meanings. A sense of belonging is also encouraged, which becomes more important as children learn about the world around them and different situations. This approach shapes their identity, social skills, and learning. We cannot overlook the importance of a sense of security, and we must also note that these early experiences can predict how well a school-age child will cope with their social role later on.

6.2 PEER TUTORING IN EARLY CHILDHOOD EDUCATION



Key Points in Peer Tutoring

- Education
- Socialization
- Peer Tutoring Foundations

Early childhood education is not understood only as the transition of knowledge. An equally important aspect is the process of socialisation. Education involves purposeful interaction between the child and the educator, during which external influences gradually become part of the child's internal attitudes, values, and patterns of behaviour (Kolář, 2012).

In the pre-school system, education and upbringing therefore form a closely connected whole. The aim is not limited to cognitive development but also includes the formation of the child's personality, the development of self-esteem, and the ability to function within social relationships.

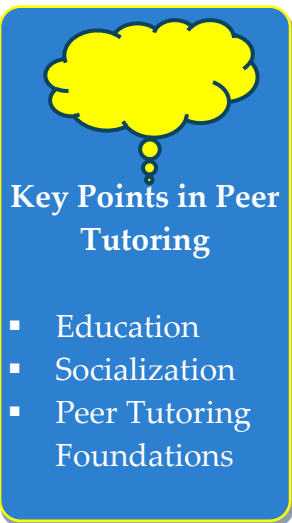
In early childhood, socialisation primarily occurs through everyday interactions. These interactions occur within families, in educational environments, and among peers. Through such experiences, children gradually learn what forms of behaviour are socially expected, how to regulate their emotions, and how to respond in different social situations. Research has shown that socio-emotional competence in early childhood is closely related to school readiness and later school adjustment (Denham et al., 2003). Social interaction should therefore not be seen as something

secondary to learning; rather, it forms an essential basis for both educational progress and social inclusion.

Educational approaches based only on external control may limit the development of intrinsic motivation. For long-term development, internalisation is essential. This process refers to the gradual adoption of norms and values as personally meaningful. When children understand the purpose of shared rules and can participate in everyday social routines, they are more likely to accept these expectations as their own (Svobodová, 2022). Intrinsic motivation is strengthened when activities are meaningful, when children have some degree of autonomy, when cooperation is encouraged, and when feedback is supportive and constructive (Kopřiva et al., 2009). These principles also form an important foundation for the use of cooperative learning approaches in early childhood education.

6.2.1 Safe Structure as a Basis for Social Learning

A predictable and well-organised environment is an important condition for children's sense of safety and psychological stability. When children feel secure, they are more willing to explore their surroundings and participate in social activities. Clear and consistent boundaries help them orient themselves in everyday situations and allow them to focus on interaction and shared activities rather than on protecting themselves from uncertainty (Svobodová, 2022). At the same time, reasonably set rules create space for children to negotiate roles, cooperate with others, and gradually adopt shared norms of behaviour.



From a sociocultural perspective, development is closely connected to social interaction. Learning does not occur in isolation but emerges through cooperation with others. Vygotsky (1978) described this process through the concept of the Zone of Proximal Development, which refers to the area in which a child can accomplish tasks with the support of more capable peers or adults. In joint activities, children observe one another, imitate strategies, and engage in dialogue as they solve problems together. Through these experiences, they gradually build knowledge and adopt both cognitive and social ways of acting.

6.2.2 Peer Interaction as a Developmental and Inclusive Context

Empirical studies increasingly emphasise the role of peer interaction in pre-school education. A comprehensive overview was presented by Watkins et al. (2015), who showed that targeted peer-mediated activities can significantly support the development of social communication and engagement in young children, especially those with developmental difficulties. Research that reached similar conclusions and confirmed these findings was presented by Gottfried, Garcia, and Kim (2019), whose study on peer tutoring in pre-schools showed positive correlations with both academic skills and socio-emotional growth.

Activities involving peers thus create natural and desirable opportunities for children to try out a range of important social skills through play and everyday activities. Through shared play and learning, children learn that others react differently, have different perspectives, regulate their emotions, cooperate, and resolve conflicts. These competencies are known to be closely related to later school adjustment and overall social functioning (Denham et al., 2003). For children with diverse developmental needs, structured peer interaction can also reduce feelings of isolation and promote active participation in the group (Watkins et al., 2015).

6.2.3 From Socialisation to Peer Tutoring

A child's education and development are a process influenced by several factors. One factor, closely related to this topic, is the environment. Education should be viewed as a process of social learning, in which a supportive environment plays an important role. It is precisely this environment that provides the path to applying the principles of mutual learning. Experts need to be familiar with the principles of child development and the processes underlying it. Only then can we apply mutual learning effectively. However, we also note that mutual learning is naturally present in the process of supporting young children's development. The application of these principles contributes to learning through imitation, sharing attention, mutual regulation, and all this through joint activities.

Mutual learning is not and should not be a form of artificial intervention in natural learning processes. Rather, it is necessary to build on everyday interactions between children and give them a clearer structure and meaning within the educational and support process. This approach then brings us to areas such as the internalisation of application in everyday activities, intrinsic motivation, and cooperative learning. In an inclusive environment, it is important to strengthen respect and belonging and develop relationships within the group.

6.2.4 Peer Tutoring in Early Childhood Development

Mutual learning in early childhood is based on the principles of mutual interaction among children, which occurs in a natural and

normal environment. This learning is based on developmental processes. These processes include imitation, shared attention, consideration, and cooperative play. It should be noted that in these processes, we do not emphasise performance or



Key Points in Peer Tutoring

- Mutual Learning
- Environment
- Child Development
- Imitation
- Shared Attention

comparison. On the contrary, the importance lies in focusing on cooperation, connection/sharing, and mutual support. During these interactions, children learn new skills. At the same time, they also learn how to help others, encourage friends and peers, be empathetic, wait their turn, and respond to others' needs. Such experiences can strengthen children's self-confidence, emotional security, and sense of belonging to a group.

This textbook is intended for caregivers and early childhood professionals who work with children aged 2 to 7. The principles mentioned also apply to children with developmental, social, or health disadvantages. The aim is to combine theoretical knowledge (especially knowledge of child development and their needs) with practical strategies that can be used in everyday activities and play situations. The Peer Tutoring module is divided into five related areas:



Figure 11. *Areas of Peer Tutoring*

As mentioned in the introduction to this text, early childhood is the period between the ages of two and seven. It is one of the most important stages of development and a period when children are shaped and significantly influenced by their environment. At this age, language, communication skills, thinking, social understanding, and emotional regulation develop. The social environment and learning through imitation and play are of great importance in a child's life. It is during this period that social learning, interaction, and play activities are particularly

important, far more so than formal learning. These areas are significant, but also natural and powerful actors in the child's learning process.

Mutual learning is a situation in which children learn from each other and together. They observe each other or the group, imitate actions, offer help, give or "share" small pieces of advice, or naturally share experiences during play and everyday activities. In early childhood, this process is usually informal and natural. It does not involve fixed roles for teachers but is based on normal interactions among children and between children and adults. The above is based on sociocultural theories of development, which emphasise that learning, as such, first occurs in social interaction and is later internalised by the child (Vygotsky, 1978). We can add to this topic the conclusions of some research studies that highlight the importance of mutual learning, especially in the early stages of child development. One such study is that of Gottfried, Garcia, and Kim (2019), which showed that peer tutoring in kindergartens is associated with better outcomes for children, greater engagement, and stronger socio-emotional development. The study shows that children who learned together with their peers showed greater motivation, better attention, and more active participation. From this, we can conclude that learning through peer tutoring becomes more accessible and meaningful. For young children (ages 2-7), joint activities often facilitate trying new things, learning, motivation, and learning sequencing when completing tasks.



Mutual Learning

Study Gottfried et al.
(2019)

Mutual learning also plays an important role in social and emotional development, as supported by numerous theories and studies. Through daily interaction with their peers, children practice a range of skills, including taking turns, assuming roles, cooperating, communicating, and managing their emotions. Children learn how to offer help, how to ask others for help, and how to deal with minor problems that arise during play or when completing tasks, or even simply during play. At the same time, and we consider this important, they experience success together with others. These early social experiences are closely related to later school readiness and adaptation to the school environment (Gottfried et al., 2019).

For some children, peer learning can be very beneficial. We are referring, for example, to children with developmental delays, autism spectrum disorders (ASD), social disadvantages, or disabilities. Interaction with peers often reduces pressure on the child because it is natural, occurs during natural activities, and is part of normal activities the child is familiar with and understands. For children, these situations and experiences with peers are natural and easier than adult-led learning. In these situations, children engage in joint activities in their own way, naturally participating in activities that are safe for them, gradually gaining experience and confidence. Peer tutoring allows children to build relationships with one another, which also fosters a sense of belonging.

In an inclusive environment, it is very important to develop a positive atmosphere and mutual respect, because without a positive climate in the group, inclusion will not work. Children who need different levels of support meet here, and we can take advantage of this by encouraging children who need less support to help others, thereby promoting cooperation, fostering respect, and teaching children to assume different roles. Another benefit is that children learn patience, empathy, and responsibility. Children with disabilities or disadvantages can then be better

accepted, experience success, and be part of the group. As Gottfried et al. (2019) note, the benefits of mutual learning extend beyond individual contributions to children's development. They also influence the group's social climate.

For caregivers, mutual learning should be seen as a normal part of activities with children rather than formalised education or a learning method. Peer tutoring needs to become part of normal daily activities and take place as naturally as possible. The goal is not to evaluate performance, determine rankings, or compare skills. Rather, the aim is for children to learn to share, help each other, and imitate each other during the day while playing, thereby developing naturally. What is important are shared experiences, mutuality, and support. The aim is to establish inclusive approaches, which should ideally be part of lifelong learning.

6.2.5 Developmental and Inclusive Foundations

Mutual learning among children in early childhood is based on the principle of observation. Simply put, children learn from each other and imitate each other in a completely natural way. That is why shared, mutual activities are important, even though a small child is often a "mere observer" in an unfamiliar environment or situation, or seemingly pays no attention to it. Trying new activities, new ideas, and new stimuli is just as important. These findings aren't new and are based on long-established theories, such as sociocultural theory, which describes learning as a process that first occurs through interaction with others and only later is adopted by the child as their own understanding (Vygotsky, 1978). For children in the target group, interaction with peers is therefore not just a supplementary part of their development. It is one of the main ways in which language, thinking, and social understanding develop.



Children imitate each other while playing, taking turns, solving issues together, or helping a friend.

We will examine this topic through the eyes of experts and researchers, as studies conducted in kindergartens show that children achieve better learning and socio-emotional development outcomes when the principles of peer tutoring are applied (Gottfried, Garcia, & Kim, 2019). Activities carried out with peers are often more meaningful for children, and children are more willing to participate. It is quite clear that without positive motivation, it is very difficult to get children involved.

We may ask ourselves what happens during mutual interaction. The answer is quite simple. Children imitate each other while playing, taking turns, solving small but important issues together, or sometimes helping a friend with a simple task. They play different roles. Gradually, they gain confidence, find their place in the group, and discover their strengths. Children also learn to see situations in a slightly different way than just through their own eyes. All of this helps them manage their emotions and learn to cooperate. Research also shows that peer tutoring can strengthen both children's involvement and the quality of peer relationships (Gottfried et al., 2019). In general, we can understand peer tutoring as an appropriate approach that corresponds to the child's stage of development, and as one that supports children with disabilities or social disadvantage.

6.2.6 Peer Tutoring and Children with Special Needs

In the previous text, we described that peer tutoring is important for all children. Still, it is necessary to emphasise that this approach is very important for children with any disadvantage and for inclusive education. This text applies in particular to children with developmental disorders, autism spectrum disorders (ASD), or children growing up in socially disadvantaged conditions. Supporting peer interaction is particularly important for these children, as they may have difficulty adapting for many reasons and have less experience with social interaction. Research shows that mutual interaction in an inclusive environment promotes communication

and social interaction, thereby enabling disadvantaged children to participate, learn adaptive behaviour, and gain experience, which in turn supports their development (Chang, Locke, & McCune, 2020).

Chang et al. (2020) also point out that these strategies are particularly effective when we do not create them too "artificially" but incorporate them into everyday activities with an emphasis on play, which is most natural for children and ultimately also the most effective. However, we must realise that, given the age of the child (the principle of development must be applied), these are short, structured interactions. One example is the well-known approach based on the principle "Stay, play, talk," which encourages children to stay close to their peers, engage in shared play, and communicate with each other during the activity (the level of communication varies by age). Simple but effective strategies can help us limit social isolation and increase social interaction.

6.2.7 Practical Dimensions of Peer Tutoring in Early Childhood

Peer tutoring is very important for children with developmental delays, as research shows that structured peer interaction in early childhood leads to the development of social communication skills, increases engagement, and contributes to greater adaptability in everyday activities (Watkins et al., 2015; Zhang et al., 2022). In a pre-school setting, peer learning usually takes a simple form. Children can work as friends or learn alongside peer role models during play and everyday activities. The emphasis is not on formal teaching but on children participating in a shared activity in which they observe one another and provide small amounts of support.

Peer-mediated approaches have been shown to increase both the frequency and quality of interactions among children, while helping reduce social isolation and certain problematic behaviours (Watkins et al., 2015). Joint activities are not just

about mutual learning but also about the comprehensive development of children: they practice communication and cooperation and develop a sense of belonging. As we have already noted, these interactions are based on games and everyday situations and are completely natural for young children. For children with disabilities, peer tutoring can foster social learning: children learn from each other effectively and do not have to rely solely on instructions from adults (Zhang et al., 2022).

6.3 MODULE 1, MUTUAL LEARNING

6.3.1 Theoretical Foundations of Mutual Learning in Early Childhood

Mutual learning can have different meanings depending on the age of the children we work with. In early childhood, it describes situations in which children learn together through shared activities that should be as natural as possible and respect the child's stage of development. When children work side by side, exchange ideas, or try to find solutions together, learning becomes deeper and more meaningful for young children. Research studies show that peer interaction and cooperation among children can promote understanding and the development of social skills (Tenenbaum, 2019). In pre-school age, this often occurs during cooperative games or simple problem-solving activities—e.g., finding our way out of a maze together, putting together a picture, or finding out where the keys are hidden. When playing or building together (e.g., a bridge over a stream), children talk, respond to each other's ideas, and gradually learn to cooperate, share tasks, function in a group, and take on new roles (Ramani, 2014). Research shows us that this often happens quite naturally in children. Children share tools, give each other advice, or participate in joint activities that promote both learning and social interaction (Barros-Blanco et al., 2022).

In addition to cooperation, children learn to resolve minor conflicts and disagreements, which contributes to the development of social interaction and communication. Role-playing is also important, as it allows children to gain new experiences and strengthens their perception of interaction with their surroundings. Is (Ramani, 2014; Tenenbaum, 2019).



Mutual learning - where children observe one another, share strategies, and learn together

Another important area that should be mentioned here and is also documented in research findings is the development of thinking and socio-emotional development. When children work together, they learn to control their behaviour, consider others' attitudes and wishes, and work towards a common goal (Howe & Mercer, 2017). We should also mention the importance of inclusive education, where, due to differences in needs and developmental specifics, children may have little experience interacting with one another. Mutual learning thus creates a natural environment for observing behaviour, practising communication, and forming relationships. In this way, interaction with peers can help reduce social isolation, an area crucial to a child's further development in an inclusive environment (Odom et al., 2013). Mutual learning can therefore be understood not only as a developmental approach, but also as an important, inclusive educational approach based on everyday, natural interaction between children.

6.3.2 Mutual Learning in Peer Tutoring: Individual Parts

In young children, mutual learning usually occurs in completely normal situations; often, there is no need to "artificially" create situations to make it happen. It occurs during play, joint activities, task completion, and rehearsal for plays. Through these interactions, they observe each other, try out different ideas, assert themselves, and gradually figure out how things work together. They learn different strategies and become familiar with different approaches that may differ from what they have encountered so far, so they must give children space to adapt.

In practice, mutual learning can cover several areas. Through these activities, children gain experiences that support the development of communication, social skills, and self-regulation. They also help children feel like part of a group (Ramani, 2014; Tenenbaum, 2019).

- ***Observation and imitation*** – children watch what their peers are doing and try to repeat the same activities or strategies; active involvement of the child is not always necessary. The child is in an observer role here.
- ***Joint problem solving*** – children work together to complete a task, such as building a wall, a sandcastle, or finding a way to overcome a small difficulty – making a boat out of bark, building a shelter.
- ***Exchanging ideas and strategies*** – children show each other different ways of doing something, such as how to find a "hiding place" or, for older children, "how to catch someone" or play a prank.
- ***Taking turns and cooperating*** – children coordinate their actions and share roles or responsibilities – sandbox games are ideal here – loading sand, building a tunnel, etc.
- ***Helping and guiding behaviour*** – children offer simple forms of help, comments, or encouragement – a simple competition.
- ***Joint attention and shared engagement*** – children focus together on the same activity or goal – recognising sounds, playing "silent telephone."
- ***Mutual roles*** – children naturally switch between observing, leading, and following. An example of this is rehearsing a simple scene or demonstrating.

6.3.3 Inclusive Dimension in Mutual Learning

In an inclusive environment, we often find ourselves needing to individualise our approaches to children more, which can complicate mutual learning and thus

interfere with the natural flow of interaction. However, joint learning can support mutual interaction, and activities that depend less on the child's individual needs can be implemented. These steps lead to shared experiences and the development of empathy and trust.

Through interaction with their peers, children gradually learn to cooperate, perceive others' differences, and, when necessary, not only offer but also accept support from their peers. An inclusive environment thus has the following possibilities:

to support the participation of children with different developmental abilities and different levels of support,

- to adapt activities so that children with different needs can participate,
- to set up an environment for peer-to-peer sharing and interaction.
- strengthen social participation and reduce isolation,
- promote empathy and acceptance of differences within the group.

Through mutual interaction, children gain new experiences, take on new roles, gain social experience, and are "forced" to solve problems. At the same time, these interactions help build stronger relationships with peers and encourage participation in joint activities (Barros-Blanco et al., 2022; Odom et al., 2013). Mutual learning is based on the principle of development, i.e., it respects the natural stages of development, individual developmental periods of children, and the natural way young children learn. In children aged two to seven, learning with peers often promotes communication development, encourages efforts to initiate communication, allows children to interact with each other, expands their vocabulary, and engages them in completing tasks. Research shows that structured



Through interaction with their peers, children gradually learn to cooperate, perceive differences between others, and not only to offer but also to accept support from their peers.

peer interaction can increase social participation, reduce isolation, and contribute to better integration and development among disadvantaged children. Caregivers (teachers, parents, social workers) should create opportunities to share ideas and experiences, and to offer activities in which children help each other, become part of a team, and support individual development. Learning is thus based on mutual relationships and the sharing of experiences.

6.4 MODULE 2, THE CHILD AS A TEACHER

6.4.1 Theoretical Foundations of the "Child as a Teacher" Approach

The module entitled "The Child as Teacher" is based on the idea that children take on the role of teacher or guide in joint activities, often in small leadership roles. An example of this is when a child shows a friend how to do something, shows a new child around the nursery, explains the rules, or guides them in a game. In early childhood, these roles and their acceptance are important for mutual learning. Children observe one another, perceive their positions and roles, try new things, and accept their friends as "teachers."

If we look at the same situation from the other side, research shows that the role of the "teacher" contributes to a child's learning. When children describe procedures, rules, and activities, they develop their thinking. This role allows them to organise their understanding of roles and rules, which in turn leads to the development of communication skills (Fiorella & Mayer, 2015). Studies show that this approach has a dual impact: it supports thought processes and social development.

Given that these roles naturally arise in environments such as nursery schools/pre-school institutions and are created in everyday situations, such as play or

following a teacher's instructions, it is appropriate to focus on these situations and encourage them. Research shows that learning strategies that involve peer assistance (helping find solutions, explaining rules) can increase children's engagement, communication, and participation in activities while promoting cooperation and responsibility (Roscoe & Chi, 2017). In addition, taking on small "leadership" roles can boost children's self-confidence, language use, and social skills. When leading others, children practice and learn to explain their ideas, notice what others are doing, and then adapt their behaviour within the group activity.

We must not forget the social aspect, which in this context strengthens children's autonomy. Younger children or children with less experience of social interaction gradually assert themselves and begin to perceive themselves as part of the group. All these aspects contribute to the child's motivation and self-esteem (Wentzel, 2017). In this concept, the "child as teacher" approach encourages children to actively engage in learning rather than remain passive participants.

6.4.2 "Child as a Teacher" Approach: Individual Parts

In the previous paragraph, we mentioned that children often take on the "role of teacher" quite naturally during play or social activities. For children aged two to seven, this can include several common forms of interaction:

- ***Demonstrating activities*** – showing a friend how to complete a task or activity.
- ***Simple explanations and verbal guidance*** – describing steps and procedures in simple language that is understandable to friends.
- ***Modelling behaviour*** – providing examples of how something can be done – involves imitating peers' behaviour.
- ***Guiding and helping peers*** – supporting another child during an activity – often during play or group activities.

- *Leading roles in joint activities* – sometimes leading a task or suggesting what to do next (this may be, for example, the role of group leader, the role of the child who performs the task, or who is given responsibility).
- *Observation and feedback* – perceiving what a peer is doing and offering simple corrections or encouragement. These activities contribute to emotional development and tolerance.
- *Role "change"* – children naturally switch between the roles of leader and learner, thereby teaching each other and perceiving different roles and attitudes.

Experiences such as these can strengthen communication, responsibility, perceptions of roles and position in the group, and self-control. They also help children to be motivated to engage in activities and overcome obstacles. Children thus gain self-confidence and self-assurance, which is important for functioning in a group and perceiving oneself (Fiorella & Mayer, 2015; Roscoe & Chi, 2017).

6.4.3 Inclusive Dimension of the "Child as a Teacher" Approach

An inclusive environment for preschool-aged children and those in early development provides space for meaningful and functional involvement of children with different needs who are part of a single collective or group in the area of mutual learning. Children with disabilities (health, social, or language) gain valuable experience by observing their peers, which helps them adapt and participate. They gradually accept simple instructions and interact with other children. The involvement of children thus becomes a completely natural, undemanding process. Often, it is enough to give children space to interact with each other.

On the other hand, the other children strengthen their social interaction skills, which works both ways. Children learn mutual patience and tolerance, and gradually develop the ability to see situations through others' eyes. Research shows that these interactions contribute to the development of communication and social

interaction, as well as to the involvement of young children with special needs (Brock & Huber, 2017).

When children help each other during activities, learning becomes a shared responsibility that they manage themselves, rather than under an adult's direction. Supporting the "child as teacher" approach helps to strengthen cooperation and inclusion.

We can say that the use of simple roles (or role-playing) in peer learning in early childhood can support both learning and social development. Taking on peer tutoring roles helps young children and preschoolers deepen their understanding, promote communication, and build self-confidence. The research also shows that teaching others often supports one's own learning and increases engagement in activities. In an inclusive environment, these interactions can help children with special needs feel part of the group while promoting empathy and cooperation among peers. However, it is important to note that, given the children's age, caregivers must allow these roles to emerge as naturally as possible in everyday activities, be part of games, and thus create a learning environment in which children can grow together and gradually develop their independence.

6.5 MODULE 3, PEER IMITATION

6.5.1 Theoretical Foundations of Peer Imitation in Early Childhood

Peer imitation is another form of peer tutoring in early childhood. It can be seen as learning that occurs when children observe their peers, imitate situations and behaviours, sounds, and copy simple strategies and procedures that other children use in everyday activities or play. In peer tutoring, imitation is one of the basic mechanisms through which children gradually acquire new skills, including social awareness and empathy, and subsequently engage in joint interaction.

From a developmental psychology perspective, we view peer imitation as an important means of learning at an early age. Children build language through it and, in particular, communication skills, motor coordination, and social communication, and gradually apply aspects of cognitive development (Meltzoff, 2007). When children observe what others are doing, they learn not only to repeat actions but also, quite naturally, to interpret intentions and adapt their responses in different social situations. In early childhood, peers often provide clear, mutually understandable, and accessible examples of behaviours that children can easily understand, process, and then try to reproduce in their daily activities.

Empirical research in the 1980s showed us that imitation among peers promotes learning. This learning allows children to acquire new behaviours through modelling and social reinforcement (Bandura, 1977). These activities thus contribute to the development of mutual belonging, sharing attention, taking turns, role-playing, and mutual interaction associated with cooperation. Children interact with each other during play and cooperate to complete tasks.

Studies focusing on this area show that structured peer modelling can increase social communication and adaptive behaviour in young children, especially those with developmental difficulties (Ledford & Wolery, 2015). Observing peers during everyday activities is understandable, easy to comprehend, motivating for children, and contributes to learning and development.

From a developmental perspective, imitation-based learning is appropriate for young children because it reflects their natural tendency to observe others, repeat and imitate activities, and try new behavioural strategies during social interaction. In this way, imitation contributes not only to skill acquisition but also to the development of social bonds, engagement, and mutual understanding among children.



Peer imitation means copying:

- actions
- sounds,
- behaviours

as a powerful learning tool.

6.5.2 Peer Imitation in Peer Tutoring

We encounter this learning through peer tutoring during informal social interaction, as mentioned above. Everything happens quite simply – young children often learn by watching what other children do and then trying something similar themselves, because imitation is a natural part of child development. Imitating peers in this context usually involves several basic learning processes:

- ***Imitating activities*** – copying movements, gestures, or activities related to a given task.
- ***Imitating speech and sounds*** – repeating words, simple phrases, sounds, or communication patterns used by peers, ideally with rhythm.
- ***Observing peers' strategies*** – perceiving how another child approaches a task or solves a simple problem – is again a common activity; there is no need to modulate complex situations or problems.
- ***Modelling social behaviour*** – copying behaviours such as helping, sharing, responding to instructions, challenges, or waiting for one's turn.
- ***Joint attention and shared engagement*** – focusing on the same activity while observing what others are doing.
- ***Repetition and practice*** – reinforcing skills through repeated observation and repeated attempts – we assume that children like to repeat activities, enjoy succeeding at them, gain confidence, and find activities or situations easy to master.
- ***Role reversal*** – sometimes children observe and imitate, other times they themselves become role models for others.

These processes support the development of communication, attention, motor coordination, and social skills, while encouraging participation in joint activities and spontaneous activity (Meltzoff, 2007; Ledford & Wolery, 2015).

6.5.3 Inclusive Dimension of Peer Imitation

We are focusing on the importance of learning at an early age throughout this text, especially through imitation and play. Particularly in the area of imitating peers, it is possible to create situations and subsequently opportunities for learning, especially for children with special needs (social, linguistic, or health disadvantages, e.g., ASD). It is precisely by observing what other children do, how they deal with situations, how they respond to instructions, and how they react that children can gradually practice situations in which they will gradually play their own role and subsequently become independent and self-sufficient, requiring fewer instructions from parents or other caregivers.

These are proven approaches described in many studies and clearly demonstrate that imitation can support social interaction, communication, and participation, even among young children with disabilities or disadvantages (Ledford & Wolery, 2015; Odom et al., 2013). Imitation then leads to a greater willingness in children to engage in activities, thereby helping them gain confidence, strengthen their sense of security, become more willing to participate, and gradually build self-confidence in social situations.

Just as children with disabilities can "benefit" from mutual interaction, the reverse is also true: it develops empathy and fosters responsibility. It increases awareness of the needs of people with special needs. These are naturally inclusive activities that reduce social isolation and promote positive relationships. We can therefore say that this is an important mechanism that develops a wide range of areas involving social interaction while, at the same time, promoting interaction. These activities must be developed, implemented in everyday situations, and become a natural part of children's lives.

6.6 MODUL 4, SOCIAL SUPPORT

6.6.1 Theoretical Foundations of Social Support in Early Childhood



Social support focuses on:

- cooperation
- helping
- turn-taking

In this section, we will focus on social support, which is an integral part of peer tutoring. We are referring to situations in which children help each other, try to cooperate, and respond to each other during joint activities or play. There are situations or activities where children take turns – they pass a ball to each other, tell a story, or follow up on each other to develop communication skills. It also includes mutual assistance, such as older

children helping younger ones or children setting the table together. Children can borrow tools when creating joint art projects. Encouragement in overcoming obstacles is also included. Very often, these are simple forms of interaction that create opportunities for developing social skills, where children learn to manage their emotions and build relationships with other children.

We have listed simple examples of activities supported by research studies that show that these activities, associated with positive interaction in early childhood, are closely related to social and emotional development. Everything we have mentioned is not only important for interaction but also key to future functioning and will be particularly evident when children start school, when adapting to social situations is important (Denham et al., 2003). Another important finding is that when children communicate in a supportive manner, they gradually learn to regulate their emotions, resolve disagreements, and understand other people's perspectives on situations.

In this part of peer tutoring, we also see social support as a two-way process. Children help others while learning to accept help themselves. It is thus clear that mutual help and shared responsibility can increase children's engagement, perseverance, and learning outcomes (Johnson & Johnson, 2009). Working together

also gives children the opportunity to practice communication, simple negotiation, and joint problem-solving, as well as naturally arising conflicts. These experiences contribute to social and cognitive development.

We often find that young children are willing to help others, tend to comfort others, and behave in a prosocial manner. These findings are consistent with the conclusions of studies that have demonstrated this. Experts describe this behaviour as helpful, sharing, or comforting when children are given the opportunity to cooperate during activities and games (Eisenberg, Spinrad, & Knafo-Noam, 2015). It is precisely this behaviour that forms an important basis for positive peer relationships and participation in group activities, and social support in mutual learning can be considered an appropriate approach to supporting the development and growth of young children. Daily interaction is the key to helping children learn to cooperate, develop emotional understanding, and experience shared responsibility within the group.

6.6.2 What Social Support in Peer Tutoring Includes

Given the text's focus, this section also supports mutual learning, and, given the children's age, these activities should take place in the children's natural environment and make use of everyday situations. For young children, social support typically includes **Core social processes** and **Basic social processes**. For young children, social support usually includes:

- **Cooperation** – joint efforts to achieve common goals or perform tasks together, such as a task assigned to a small group of children or even just a pair.
- **Taking turns** – waiting, sharing materials, and coordinating activities with peers: the child must wait their turn, wait before taking the glue, and let another child finish the rhyme.
- **Supportive behaviour** – helping, guiding, or encouraging – a little help with imitating activities, mutual encouragement, or cheering each other on.

- **Sharing resources** – providing access to toys, materials, or space: the child steps aside to give another child space.
- **Emotional support** – comforting or encouraging peers in overcoming obstacles: giving another child a hand and helping them up, cheering them on in a competition.
- **Shared responsibility** – participating in joint tasks or group activities: creating a surprise together.
- **Conflict resolution** – negotiating solutions and managing disagreements: agreeing on rules together, striving for mutual respect.

These processes, like those described earlier, can be quite diverse, but they share the common goal of promoting social skills, communication, and emotional regulation while strengthening peer relationships and group participation (Eisenberg et al., 2015; Johnson & Johnson, 2009).

6.6.3 Inclusive Dimension of Social Support

In an inclusive environment, it is important to build relationships based on equal access from an early age, grounded in mutual respect for needs. Mutual interaction is very important, and all the activities we have mentioned in this section contribute to this. They show that even a child with a disability, limitation, or disadvantage can be part of a group and can participate in an adapted environment or with minor adjustments or assistance.

If we link theory with practice based on an analysis of studies, we find that

research also shows that supportive behaviour and cooperative interaction can improve the social involvement and participation of young children with disabilities (Odom et al., 2013).

In joint activities, diversity becomes a natural part of collaborative learning. An inclusive learning environment supporting both individual



- Equality
- Respect

development and group cohesion is included. Of course, there are other areas of development and mutual learning is encouraged, but these areas have already been described in previous sections of the text.

6.7 MOTIVATION, IN PAIRS OR SMALL GROUPS

6.7.1 Theoretical Foundations of Motivation in Early Childhood

Motivation has already been mentioned several times in the text as an integral part of



**Motivation in pairs
or small groups –**

**shared goals
increase
engagement,
persistence, and
enjoyment.**

early childhood learning. In peer tutoring, we view motivation as a process. During this process, children engage in joint activities, work towards common goals, and encourage (motivate) each other to continue participating. In pre-school, motivation is closely linked to social interaction and cooperation. When children work in pairs or small groups, learning becomes more meaningful, and they are more motivated. Joint tasks give children the opportunity to experience success, share that success, receive encouragement from others, and enjoy the activity itself. These experiences can strengthen children's willingness to participate, which is a big step towards making the entire learning process successful.

Young children are significantly influenced by their social environment, both positively and negatively. The environment in which learning takes place (e.g., kindergarten) also plays a role. This claim is supported by studies of early childhood development, which show that children's motivation is strongly influenced by the social environment in which they learn. Children often show higher levels of engagement and attention when activities involve interaction with peers than when they involve individual work or activities with adults only (Wentzel, 2017). All of the

above facts are also related to the child's internal motivation, personality, and previous experiences.

From a theoretical perspective, we can mention, for example, self-determination theory, which holds that motivation develops when three basic psychological needs are satisfied: autonomy, competence, and relatedness (Ryan & Deci, 2017). It is therefore important to find an answer to the question of how to support these needs. One way to do this is through shared goals and cooperative tasks. Children can make small decisions, experience progress and success, feel a sense of belonging, create something, be part of something, and participate in meaningful interactions with others. Such experiences often make educational activities more engaging and help children stay involved for longer periods, and, of course, they are also related to motivation.

As we have already described here, the environment plays a role in determining a wide range of processes, and its value in supporting cooperative learning should be emphasised. Activity and cooperation are key activities that determine motivation and the desire to get involved. Children then tend to be more persistent and take a more positive approach (Gillies, 2016). Working in pairs or small groups encourages children to support each other and share responsibility during activities, which contributes to cognitive development, social learning, and, last but not least, motivation, which is especially necessary for young children.

6.7.2 Motivation in Peer Tutoring

Motivation is the key to success, but the motivation must be appropriate for the child, the child must be motivated appropriately, and the motivation must meet their needs. In early childhood, motivation often develops through shared experiences and cooperation in meaningful activities. If we were to observe the work/cooperation of

young children in a group or pairs, we could notice several basic motivational processes:

- ***Common goals***: children work together to achieve a common result or complete a task. A pair of children has the task of preparing art supplies for the whole group.
- ***Joint engagement***: children focus on the same activity or challenge for a certain period of time. Two children learn a rhyme together, taking turns in individual verses. It depends on the difficulty and age of the children.
- ***Mutual encouragement*** - children respond to the efforts of others and support their involvement in the activity - a more experienced child encourages the other to master the activity, for example, in pairs competitions.
- ***Persistence on a task*** – children continue with the activity even when difficulties arise – when building a bridge, the materials run out; they have to solve the problem together. They are motivated to complete the task because they will be rewarded.
- ***Joy and positive experience*** – children experience joy, interest or a sense of satisfaction during joint learning.
- ***Active participation*** – children show willingness to try new activities or procedures – motivation to learn new things.
- ***Shared responsibility*** – children participate in the common outcome of a group activity, such as a joint decoration.

These processes can and should strengthen intrinsic motivation and longer-term engagement in the activity, while also supporting cooperation and positive interaction between children (Gillies, 2016; Ryan & Deci, 2017).

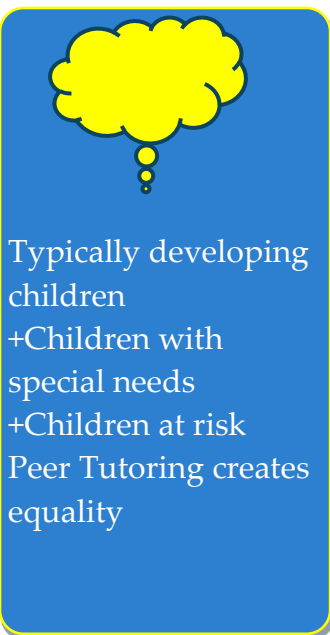
6.7.3 Inclusive Dimension of Motivation in Peer Tutoring

Pair or small-group work is intended to support the motivation of children with various specific needs, including those with developmental delays, social disadvantages, or health limitations, and thus their joint functioning. Joint activities, often very simple activities, but of great importance to the children of the target

group, allow interaction between children with disabilities or disadvantages - we can mention building a tower together, putting together a puzzle, watering plants or cleaning up toys - cooperative activities often reduce the pressure on individual performance and allow children to engage at their own pace.

Research on the approaches mentioned in this section of the text shows that cooperative activities can increase the engagement and social participation of young children with disabilities (Odom et al., 2013). Interaction with peers also provides natural encouragement; children can help each other, and they are not alone in completing a task or activity.

These experiences support the engagement of children who might otherwise withdraw, remain alone, or avoid completing tasks. They also help typically developing children learn cooperation, patience, and respect for differences. Shared activities thus contribute to motivation, positive peer relationships, and inclusive participation in the early learning environment.



6.8 SUMMARY

This text-coursebook, focusing on peer tutoring, provided a theoretical overview of several modules and emphasised early childhood, when the needs of children with

social, health, or other disadvantages were also taken into account. The text highlights one of the main ideas of the topic. Mutual learning is a natural part of a child's development. A child must have sufficient opportunities to interact with peers. There is no need to focus on complex activities. Still, it is necessary to base them on the child's knowledge, take into account his previous experiences, and consider his strengths, weaknesses, and environmental influences. The main means of development is play, which is a natural part of young children's learning. Children imitate each other quite naturally. Therefore, mutual learning and interaction should become a natural part of development and an integral part of inclusive practice.

The text is organised into several thematic areas, called modules, that describe common and natural ways in which children learn from their peers: peer learning, the child as a teacher, peer imitation, social support, and motivation in pairs or small groups. Each module focuses on how to adjust everyday activities so that children have the opportunity to observe others, share responsibility, and participate in joint tasks. These are often very simple strategies.

We include rituals, repetition of activities, games - imitative, competitive, and movement. These activities support the development of communication, motor skills, and social interaction. We must not forget about mutual support between children, because that is when children practice patience, tolerance, and mutual respect. The text also focused on motivation, without which most activities for children cannot be done. Motivation can be the effort to complete a common task – to build a bridge, to complete a puzzle, to run to the finish line together, to learn a short scene or a short song, when the effort to achieve the goal leads to mutual encouragement. Each module also focused on inclusion and the involvement of children who need different levels of support. Some basic principles are repeated; in some models, we tried to include specific details related to the module.

In conclusion, we can state that it is necessary to look at delicate situations, at first glance ordinary situations or games comprehensively, not to try to invent

complex activities and activities, but to respect the child's level of development and his individuality, and not to forget that children learn best naturally from each other.

6.9 PROBLEMS

1. Mutual learning in early childhood primarily supports children in:
 - a) memorising information independently
 - b) observing peers and sharing strategies during activities
 - c) competing for the best performance
 - d) completing tasks without interaction
 - e) following adult instructions only
2. Which activity represents mutual learning best in peer tutoring?
 - a) Children take a written test individually.
 - b) Children build a tower together and share ideas
 - c) The teacher explains all steps without interaction.
 - d) Children watch a video silently.
 - e) Children do not cooperate.
3. In the "child as teacher" approach, children mainly:
 - a) replace adult instruction permanently
 - b) evaluate other children's performance
 - c) guide peers by demonstrating and explaining tasks
 - d) compete to show the best skills
 - e) work without support from adults
4. What is a key benefit of giving children simple teaching roles?
 - a) Reducing peer interaction
 - b) Increasing dependence on adults
 - c) Strengthening confidence and communication skills
 - d) Limiting cooperation
 - e) Preventing mistakes
5. Peer imitation helps young children mainly develop:
 - a) written academic skills

- b) social, language, and motor abilities
 - c) test performance strategies
 - d) independent competition skills
 - e) passive listening habits
6. Which situation demonstrates peer imitation?
- a) A teacher corrects a worksheet.
 - b) Children copy a friend's movement in a game.
 - c) Children complete separate tasks quietly.
 - d) A child studies alone.
 - e) Children receive rewards for silence.
7. Social support in peer tutoring focuses primarily on:
- a) individual achievement
 - b) cooperation, turn-taking, and helping behaviour
 - c) strict rule enforcement
 - d) independent work
 - e) competition between peers
8. Which caregiver strategy best promotes social support among children?
- a) Assigning tasks to children individually.
 - b) Preventing children from helping each other.
 - c) Modelling helping behaviour and encouraging cooperation.
 - d) Focusing only on academic outcomes.
 - e) Limiting peer interaction.
9. Shared goals in peer tutoring mainly increase children's:

- a) dependence on external rewards
- b) engagement and persistence
- c) competition between peers
- d) avoidance of challenges
- e) preference for individual work

10. Which activity best supports motivation through group learning?

- a) Individual worksheets.
- b) Silent reading without interaction.
- c) A team treasure hunt with shared goals.
- d) Teacher-led lecture.
- e) Independent testing

Answer Key

1.b, 2.c, 3.c, 4.c, 5.b, 6. b., 7.b, 8.b, 9.b, 10.c

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Self-Determined Daily Living Skills in Young Children With Special Educational Needs



CONTENTS

- Introduction
- Potential Roles of Parents or Caregivers in the Early Childhood Period
- Early Self-Determination Skills for Children with Special Educational Needs
- Engaging In Self-Directed Learning Activities
- Self-Determination in Early Childhood



LEARNING OUTCOMES

- After studying this unit;
 - Describe the choice-making skills,
 - Describe the decision-making skills,
 - Describe the goal setting skills,
 - Describe the problem-solving skills, and
 - Describe the self-direction skills

THE SPECIAL EDUCATION COURSE BOOK FOR CAREGIVERS

Damla Altın, Ph.D. & Bekir Fatih Meral, Ph.D.

UNIT NO: 7

Self-Determined (SD) Daily Living Skills in Young Children with Special Educational Needs

Choice-Making

Decision-Making

Goal-Setting

Problem-Solving

Self-Direction

7 SELF-DETERMINED DAILY LIVING SKILLS IN YOUNG CHILDREN WITH SPECIAL EDUCATIONAL NEEDS

7.1 INTRODUCTION

Developing self-determination skills in children with special educational needs (SEN) is a crucial factor in their outcomes in daily life, social life, school life, and post-school years (Meral et al., 2022). Self-determination should be seen not only as a skill, but also as a crucial element for children with disabilities to develop their human dignity. Especially during early childhood, parents or primary caregivers play a crucial role in developing self-determination in children with disabilities (Palmer et al., 2013).

“Self-determination is a dispositional characteristic manifested as acting as a causal agent in one’s life. Self-determined people (i.e., causal agents) act in service to freely chosen goals (Shogren et al., 2015); p. 258)”. The foundational skills of self-determination are Choice-making (CM), Decision-making (DM), Goal setting (GS), Problem-solving (PS), and Self-management (SM). Although some studies have been conducted worldwide and in Türkiye on the responsibilities of parents in developing self-determination abilities in children with disabilities, there are no county (Türkiye) reports or studies on the roles of caregivers in fostering these skills (Carter et al., 2013; Martin et al., 2005; Meral et al., 2023; Shogren & Wehmeyer, 2017; Zheng et al., 2015).

7.2 POTENTIAL ROLES OF PARENTS OR CAREGIVERS IN THE EARLY CHILDHOOD PERIOD



Early childhood is the most critical period for all children.

The term "young children" encompasses children aged 3-5, but we can broadly apply early self-determination skills to children aged 2-7, with or without special education needs. Early childhood is the most critical period for all children, regardless of whether they have disabilities or special educational needs, especially in terms of their cognitive, social, and psychological development. Therefore, parents, educators, or caregivers play a vital role in children's development and in preparing them for later stages of life.



"Deciding to foster independent life skills or self-determination of children with/without special educational needs does not mean to release or laissez-faire. Parents or caregivers can create a supportive environment."

Specifically, the potential roles of parents or caregivers might include fulfilling all the tasks on behalf of the child or providing opportunities to support them in becoming more independent children during early childhood and, of course, later stages of life. Therefore, parents or caregivers should decide on one of two options: to take on all caregiving responsibilities and do everything for the children, or to create a positive environment for their children to develop independent living skills. Undoubtedly, all parents should consider this often-postponed or ignored question: "What will happen to my child after if I die?"

Deciding to foster independent life skills or self-determination of children with/without special educational needs does not mean to release or laissez-faire. Parents or caregivers can create a supportive environment by establishing daily routines or opportunities to foster early self-determination skills, including choice-making, decision-making, goal-setting, problem-solving, and self-

management. These skills will later support more advanced self-determination skills in life, such as autonomy and self-defense, self-management, and self-awareness.

7.3 EARLY SELF-DETERMINATION SKILLS FOR CHILDREN WITH SPECIAL EDUCATIONAL NEEDS

The self-determined daily living skills module aims to support caregivers (including parents or practitioners as well) in how they can use daily play and home activities as learning and developmental opportunities to help children with special educational needs, including autism, and become more self-determined in managing their daily living routines and tasks. Specifically, it focuses on how to support child with special educational needs, including autism in developing independent living skills, how they can participate in activities and interact independently, and how they can apply daily living skills in accordance with their personal interests and preferences, considering contextual situations and social connections for daily life.

In children with disabilities or special educational needs, early self-determination skills essentially refer to developing abilities such as choice-making, decision-making, goal-setting, problem-solving, and self-management from an early age.

1. **Choice-making (CM):** Choice-making means deciding what one wants from among two or more things or possibilities. For example, choosing a meal from the menu, not anybody chooses for her/his.

- 2. Decision-making (DM):** Decision-making (or supported decision-making) means having the ability to make decisions on matters that affect a person's

life. For example, deciding on a profession, health care, or financial matters.

- 3. Goal-setting (GS):** Goal-setting means that a person engages in thoughts, feelings, and behaviors to achieve the goal. For example, taking active steps to achieve the desired weight, such as following a diet regimen, exercising, and ensuring quality sleep.

- 4. Problem-solving (PS):** Problem-solving means knowing how to deal with obstacles while moving toward goals. For example, finding a solution for where and how to buy food, drinks, and kitchenware for someone who has just moved into the house.

- 5. Self-management (SM)/ Self-direction (SD):** Self-management

classified under the heading of self-direction means being able to make your own decisions and organize your own work without having others tell you what to do. For example, completing tasks with little or no support, depending on the daily routine.



“Early self-determination skills essentially refer to developing abilities such as choice-making, decision-making, goal-setting, problem-solving, and self-management from an early age.”

7.4 ENGAGING IN SELF-DIRECTED LEARNING ACTIVITIES

Self-directed learning has been defined as a process in which individuals take the initiative to identify their learning needs, set goals, identify resources, and evaluate their progress (Knowles, 1975; Almufleh et al., 2025). Considering young children with and without disabilities/special educational needs should be less complex and

simpler. Engaging in self-directed learning activities is a process management that involves initiating, maintaining, and completing an activity independently or with

support, but also includes being a causal agent in the activity. Self-directed learning activities implemented by children with special educational needs, including autism, aim to support children's autonomy and self-determination abilities through engagement with various self-directed learning activities.

Engaging in self-directed learning activities involves initiating, maintaining, and completing a task, usually individually or with the assistance of a facilitator during the activity. The use of self-directed learning activities is based on the foundations of Self-Determination Theory (SDT), particularly intrinsic motivation (Ryan & Deci, 2000). The components of self-directed learning strategies are primarily self-initiation, self-regulation (locus of control), self-motivation (intrinsic motivation), and self-reinforcement through awareness of completed tasks. During self-directed learning activities, children with or without special educational needs participate as causal agent during the intervention or while performing the activities (Shogren et al., 2015). The role of parents, practitioners, or caregivers is that of a facilitator, which involves providing support or assistance when the student needs additional help during competing tasks or activities. The role of parents, practitioners, or caregivers is to be a facilitator, which involves providing

support or assistance when students need further help while completing tasks or activities.

For example, a caregiver acting as a facilitator might use the engaging in self-directed learning activity or integrate the target behavior into the incidental teaching strategy that is a naturalistic behavioral strategy based on evidence-based practices and Applied Behavior Analysis (ABA), where learning opportunities are initiated in



"The use of self-directed learning activities is based on the foundations of self-determination theory, particularly intrinsic motivation"



"The role of parents, practitioners, or caregivers is to be a facilitator, which involves providing support or assistance when students need further help while completing tasks or activities."

natural settings or daily routines, stemming from children's interests. During a self-directed learning activity, the caregiver first prepares the hand-eye coordination corner or the preschool (early cognitive) skills station; this station may include puzzles, Lego, and Jenga wooden blocks.

The child, with or without disabilities/special educational needs, will choose one of three items based on their capacity for independent decision-making and selection (for example, they might decide to complete a Lego piece by looking at a model). Then, driven by instinctive motivation, they start, continue, and complete Lego projects. The child regulates themselves through locus of control to follow and complete the steps of the relevant activity. At the end of the activity where they complete the Lego building, they will see the work they have done and will psychologically reward themselves (self-reinforcement without tangible reinforcement, i.e., intrinsic reinforcement and motivation).

The caregiver, acting as a facilitator, primarily observes the child and their activities, providing additional support only when the child needs extra assistance. In summary, the child will be the causal agent of the action, while the caregiver will act as a facilitator during the completion or execution of the activities.



"The development of self-determination in early childhood is a holistic process shaped by the child's emerging self-awareness and increasing ability to exert control over their environment."

7.5 SELF-DETERMINATION IN EARLY CHILDHOOD

Imagine waking up one morning to find that someone has rearranged your furniture, planned every activity you will undertake throughout the day, and made all decisions on your behalf. How would you feel if another person determined what you would wear, when you would brush your teeth, and what you would eat for breakfast (Erwin et al., 2009)? In such a situation, many individuals might experience a sense of loss of control, inadequacy, or worthlessness. This is because the

ability to make choices and decisions about one's own life constitutes a fundamental aspect of being a person. For all individuals—whether they have disability or not—directing one's life in accordance with personal preferences and desires enhances quality of life (Lachapelle, 2005; Wehmeyer, 2020). In the literature, the finding that increased opportunities for choice improve quality of life is explained through the

concept of "self-determination." Considered a fundamental human right, self-determination is defined by Shogren et al. (2015) as follows:

"Self-determination is a dispositional characteristic manifested as acting as the causal agent in one's life. Causal agency implies that an individual makes or causes things to happen in their life, rather than being acted upon by others or external forces. Self-determined people (i.e., causal agents) act in service to freely chosen goals. Self-determined actions function to enable a person to be the causal agent in his or her life."

More generally, self-determination can be described as individuals' capacity to act based on their own volition. With the expansion of rights afforded to people with disabilities, approaches that once emphasized their deficits and limitations have been replaced



"Self-determination is a dispositional characteristic manifested as acting as the causal agent in one's life. Causal agency implies that an individual makes or causes things to happen in their life, rather than being acted upon by others or external forces."

by perspectives that focus on their strengths and people with disabilities play a decisive role in all aspects of their lives, ranging from the simplest daily choices — such as deciding which socks to wear — to more complex decisions, such as career selection. Self-determined individuals set goals for themselves and pursue these goals in order to achieve desired changes in their lives (Shogren & Raley, 2022). However, it would be inaccurate to equate this with complete independence. Self-determination does not imply that individuals must do everything on their own; rather, it refers to their ability to act in accordance with their own preferences while utilizing environmental supports when necessary (Shogren et al., 2015).

Although the term “self-determination” is often associated with the transition of adolescents with disabilities into adulthood, Wehmeyer and Field (2007) emphasized the critical importance of a lifelong, education-focused approach to self-determination and highlighted the need to support related skills from an early age. But what exactly do self-determination skills look like in early childhood? What observable characteristics of self-determination can be identified in young children?

The development of self-determination in early childhood is a holistic process shaped by the child’s emerging self-awareness and increasing ability to exert control over their environment. At the core of this process lies self-awareness, which begins as the child recognizes themselves as an individual separate from their caregivers, and self-knowledge, which enables them to understand their own abilities and limitations. Young children’s perceptions of their abilities may not yet be entirely accurate; they may tend to overestimate their competencies. However, recognizing that success results from effort rather than chance during this period provides an important foundation for future self-confidence and strong self-determination skills. Children translate this emerging awareness into action through choice-making and problem-solving skills. Although their early choices often reflect momentary preferences, as language develops, children begin to express their decisions more clearly. In addition, through play, children rehearse future-oriented skills such as

goal setting and goal attainment. In this way, play enables them to learn how to direct their own lives and to become the “main character” of their own life narratives (Palmer et al., 2017). Self-determination consists of several underlying subskills.

Below, key components of self-determination—namely choice-making, decision-making, goal setting, problem solving, and self-management—are described.

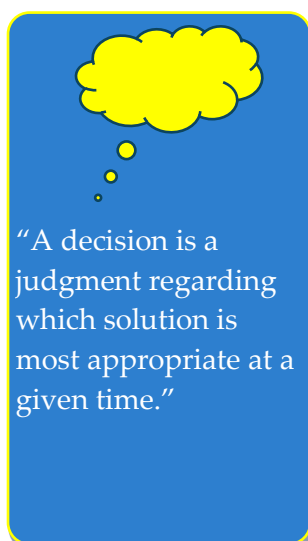
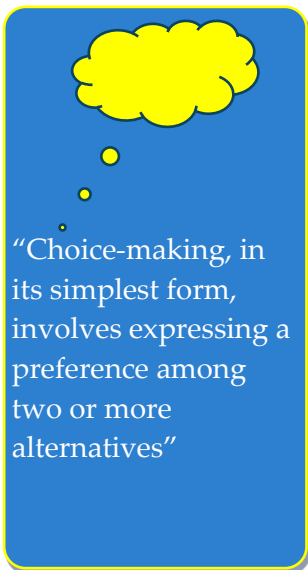
7.5.1 Choice-making

Choice-making, in its simplest form, involves expressing a preference among two or more alternatives (Shogren & Wehmeyer, 2017). For young children, available options are typically controlled by the adults in their environment. However, in order for young children with

disabilities/special educational needs to begin forming preferences and to decide what they like or dislike, they must be provided with opportunities to make choices. Supporting choice-making in early childhood also helps prevent the development of learned helplessness in later years (Palmer et al., 2013). Providing opportunities for children to choose the games they play, the toys they use, and the clothes they wear are effective ways to foster the development of choice-making skills.

7.2.4.2. Decision-making

A decision is a judgment regarding which solution is most appropriate at a given time. The decision-making process begins with problem solving and concludes with making a choice; that is, it is completed when an individual selects the alternative that best meets their goal. Although it shares similarities with choice-making, decision-making is a more complex process (Wehmeyer & Shogren, 2017). While choice-making involves selecting one option from among alternatives, decision-making requires evaluating options, considering possible outcomes, relating



them to goals, and consciously selecting the most appropriate alternative. In this sense, choice-making can be regarded as a precursor to decision-making. Problem solving constitutes an essential component of the decision-making process. For example, a child who notices that the line for the slide at a playground is long and considers factors such as waiting time, available alternatives, and personal preference before selecting the swing as a more attainable and preferred option demonstrates early goal-setting skills. Decision-making skills in young children can be supported by encouraging them to consider alternatives in everyday problem situations, discuss possible outcomes, and articulate the reasons for their choices. For instance, guiding questions such as “Which one do you think we should do first?” or “What might happen if we choose this?” can activate children’s thinking processes and support more deliberate decision-making (Agran et al., 2003).

7.5.2 Goal setting

Goals play a central role in theories and practices related to self-determination. The goal-setting process involves several steps, including defining a clear goal, considering available options, and making a choice about which goal to pursue (Palmer et al., 2017). Effective goal setting emphasizes identifying goals that are specific, measurable, and time-bound. For young children, goals are typically determined by adults. However, even during early childhood, children can be involved in aspects of the goal-setting process, such as understanding the goal, selecting between options, and expressing preferences (King-Sears & Carpenter, 2005). As they grow older, they take a more active role in setting their own goals and making decisions about what they want to achieve (Wehmeyer & Palmer, 2000). For example, when an adult introduces a simple and concrete goal—such as “Today, we will complete a three-piece puzzle”—the child can be supported in understanding what the goal is, what success looks like, and what steps might be needed. Encouraging the child to reflect on the goal (e.g., identifying the pieces needed or

describing what the finished puzzle will look like) can help develop early goal-setting skills.

7.5.3 Problem solving

Problem-solving encompasses the efforts and behaviors children display when they encounter an obstacle while trying to achieve a goal and are uncertain about how to proceed. The development of problem-solving begins as children come to understand that different situations require different skills. Over time, children learn that some outcomes can be influenced by their own efforts, whereas others depend on environmental factors (Wehmeyer & Shogren, 2020). The foundations of complex



Four self-management strategies are:

- Antecedent cue
- Self-monitoring
- Self-evaluation
- Self-reinforcement

problem-solving skills are established in infancy. However, young children's use of strategies is typically limited to simple problems with a single solution. At this stage, children may have difficulty transferring what they have learned to new situations and generally require adult support to solve more complex problems until approximately 7–9 years of age (Chen et al., 2000). Wehmeyer and Palmer (2000) emphasize that adults should not only provide children with opportunities to make choices but also guide them in recognizing problems and generating simple solutions. During the preschool period, many children can participate in basic problem-solving activities. However, children with

disabilities/special educational needs may require more structured and targeted support to develop these skills. The use of concrete objects and visual aids can be effective in supporting problem-solving abilities. For example, when two children want the same toy, an adult can guide them by asking questions such as “What is the problem?”, “How can we solve this situation?”, and “What might happen if we choose this solution?” Such support facilitates children's ability to generate solutions, evaluate possible outcomes, and regulate their own behavior.

7.5.4 Self-management

Self-management classified under the heading of self-direction refers to an individual's ability to regulate their actions by initiating, monitoring, and evaluating their behaviors in order to achieve self-selected goals, and to adapt their plans when necessary (Shogren et al., 2017). Four primary strategies are commonly used to support the development of self-management skills in children: antecedent cue regulation, self-monitoring, self-evaluation, and self-reinforcement (Shogren & Wehmeyer, 2017).

Antecedent cue regulation involves the use of visual or auditory prompts that facilitate children's initiation of the steps required for a task or activity. For example, when each step of a skill is presented through visual supports, a child can follow these cues and complete the task without requiring adult guidance. *Self-monitoring* refers to the child's ability to observe and record their own performance related to a specific skill. For instance, a child who places a sticker on a checklist after completing each step can independently track which tasks have been completed and how much progress has been made. *Self-evaluation* involves interpreting one's performance by assessing the information obtained through self-monitoring. *Self-reinforcement*, in turn, refers to the child's ability to reinforce their own progress based on this evaluation. For example, a child may provide verbal reinforcement by saying, "I did very well; I am proud of myself," or may reward themselves with a preferred activity upon achieving their goal (Shogren 2013).

Table 24

Framework for Self-Determined (SD) Daily Living Skills

SD Component	Academic Definition	Pedagogical Strategy	Early Childhood Application Example
Choice-Making	The act of selecting between two or more available options based on personal preference.	Naturalistic Instruction: Offering structured choices during routine activities (e.g., snack time, play).	A child pointing to a specific toy or choosing between two shirts to wear.
Decision-Making	A higher-order cognitive process involving the analysis of alternatives and their potential consequences.	Visual Scaffolding: Using "If-Then" visual maps to show the results of different decisions.	Choosing to wear a coat because the child understands they will be cold otherwise.
Goal-Setting	Identifying a desired outcome and defining the actions needed to achieve it.	SDLMI Model: Collaborative goal setting where the child identifies "What do I want to learn?"	A child deciding they want to learn how to zip their own jacket independently.
Problem-Solving	Identifying a barrier to a goal and generating a solution to overcome it.	Cognitive Prompting: Asking open-ended questions like "What is the problem?" and "What can we do?"	Using a stool to reach the sink when the child realizes they cannot reach the faucet.
Self-Management	The ability to monitor, evaluate, and manage one's own actions toward a goal.	Self-Monitoring Tools: Using visual checklists or digital prompts (VR/ XR) to track task completion.	A child checking a visual schedule to move from "washing hands" to "sitting at the table."

7.6 SUMMARY

The integration of Self-Determination (SD) skills into the daily living routines of young children with special educational needs (SEN) represents a paradigm shift from passive care to active agency. Grounded in Causal Agency Theory and Self-Determination Theory (SDT), this approach emphasizes that children, regardless of disability, should be supported to become the primary actors in their own lives. The focus is on designing and implementing instructional frameworks that move beyond simple task completion toward the development of five core volitional outputs: Choice-Making, Decision-Making, Goal-Setting, Problem-Solving, and Self-Management/Self-Direction.

The journey toward self-determination begins with Choice-Making. In early childhood, this is the most fundamental expression of autonomy. By providing a child with two or more options—such as selecting a specific toy or a piece of clothing—educators foster a sense of control over the immediate environment. However, as the child progresses toward Decision-Making, the cognitive demand increases. Unlike simple choices, decision-making requires the child to weigh the "pros and cons" and anticipate the consequences of their actions. For children with special educational needs (SEN) and intellectual and developmental disabilities (IDD), this is often supported through visual aids and "What If" scenarios, transitioning from reactive preferences to proactive reasoning.

Goal-Setting acts as the internal compass for self-determined behavior. It involves identifying a desired future state (e.g., "I want to wash my hands independently") and monitoring progress toward it. This process is inherently linked to Problem-Solving. When a child encounters a barrier—such as a sink that is too high or a soap dispenser that is stuck—problem-solving skills allow them to identify the obstacle and seek a solution rather than falling into "learned helplessness." Educators play a critical role here by "scaffolding" the environment; instead of solving the problem for the child, they prompt the child to act as the causal agent of the solution.

The Ultimate Goal is Self-Direction and Inclusion for every child with/without special educational needs. The culmination of these skills is Self-Management (or Self-Direction). A

self-directed child can initiate, monitor, and adjust their own activities using tools like visual checklists or digital prompts (such as VR or XR technologies). This shift from external adult regulation to internal self-regulation is the hallmark of professional practice at the special education.

Ultimately, teaching these skills in early childhood is not merely about academic achievement; it is a critical intervention for social inclusion. By fostering self-determination early, we provide children with SEN the tools to navigate healthcare, education, and community life with dignity. The transition from being a recipient of care to an agent of one's own destiny significantly enhances long-term quality of life, ensuring that individuals with disabilities are empowered to make autonomous decisions in an increasingly complex world.

7.7 PROBLEMS

1. Which of the following is the fundamental defining characteristic of 'Choice-Making' within the framework of self-determination?
 - a) Analyzing the long-term legal consequences of an action.
 - b) Expressing a preference between two or more available options.
 - c) Following a predetermined schedule without deviation.
 - d) Achieving total independence without any caregiver support.
 - e) Memorizing a list of daily routines.
2. In the context of early childhood special education, why is 'Choice-Making' considered the foundational building block of self-determination?
 - a) It requires the highest level of cognitive abstraction.
 - b) It eliminates the need for any adult supervision.
 - c) It allows the child to exercise personal agency and control over their environment.
 - d) It is only applicable to children with high verbal intelligence.
 - e) It focuses strictly on academic outcomes.
3. How does 'Decision-Making' differ from 'Choice-Making' in a clinical/educational setting?
 - a) Decision-making does not involve preferences.
 - b) Decision-making requires weighing the potential consequences of each option.
 - c) Choice-making is a more complex cognitive process than decision-making.
 - d) Decision-making is only used in vocational training.
 - e) There is no functional difference between the two.
4. A student evaluates that wearing a heavy coat in summer made them feel too hot. This evaluation is part of which SD component?
 - a) Problem identification.
 - b) Goal setting.
 - c) Decision-making (evaluating outcomes).

- d) Passive learning.
 - e) Rote memorization.
5. The "Self-Determined Learning Model of Instruction" (SDLMI; rebranded as Goal Time) emphasizes that decision-making is:
- a) A skill that cannot be taught.
 - b) A process where the teacher makes all final adjustments.
 - c) A collaborative process where the child moves toward self-regulated learning.
 - d) Only relevant for children without intellectual disabilities.
 - e) Focused solely on classroom behavior.
6. In 'Goal-Setting', the first application step for a young child with SEN is:
- a) Evaluating the performance of others.
 - b) Identifying a specific, desired outcome (e.g., "I want to tie my shoes").
 - c) Writing a 5-year career plan.
 - d) Asking for a reward before starting.
 - e) Ignoring the current level of performance.
7. When a child realizes their puzzle piece doesn't fit and tries a different orientation, they are demonstrating:
- a) Problem-solving.
 - b) Lack of focus.
 - c) Accidental success.
 - d) Dependency on the environment.
 - e) Rote learning.
8. Problem-solving in Self-Determination Theory (SDT) is linked to 'Causal Agency' because:
- a) It makes the child a passive observer.
 - b) The child learns they can act as the agent to change a situation.
 - c) It relies on external luck.
 - d) It focuses on historical causes of disability.
 - e) It is a purely mechanical reflex.

9. 'Self-Direction' (or Self-Management) is best described as:
- a) Following a teacher's finger-pointing.
 - b) The ability to monitor and manage one's own thoughts and actions toward a goal.
 - c) Being able to run in a straight line.
 - d) Total isolation from social groups.
 - e) Resistance to any form of education.
10. A student who prepares their own backpack based on a visual checklist is applying:
- a) Rote memory.
 - b) Self-direction in daily living.
 - c) Passive compliance.
 - d) Sensory integration only.
 - e) Goal-setting without action.

Answer Key

1.b, 2.c, 3.b, 4.c, 5.c, 6.b., 7.a, 8.b, 9.b, 10.b

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Emergent Literacy and Dialogic Shared Reading



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- Introduction
- Emergent Literacy
- Emergent Literacy and Reading Achievement
- Emergent Literacy Components
- Emergent Literacy for Children with Special Needs
- Dialogic Shared Book Reading
- Visual Phonics: A Multisensory Approach to Emergent Literacy
- Summary



LEARNING OUTCOMES

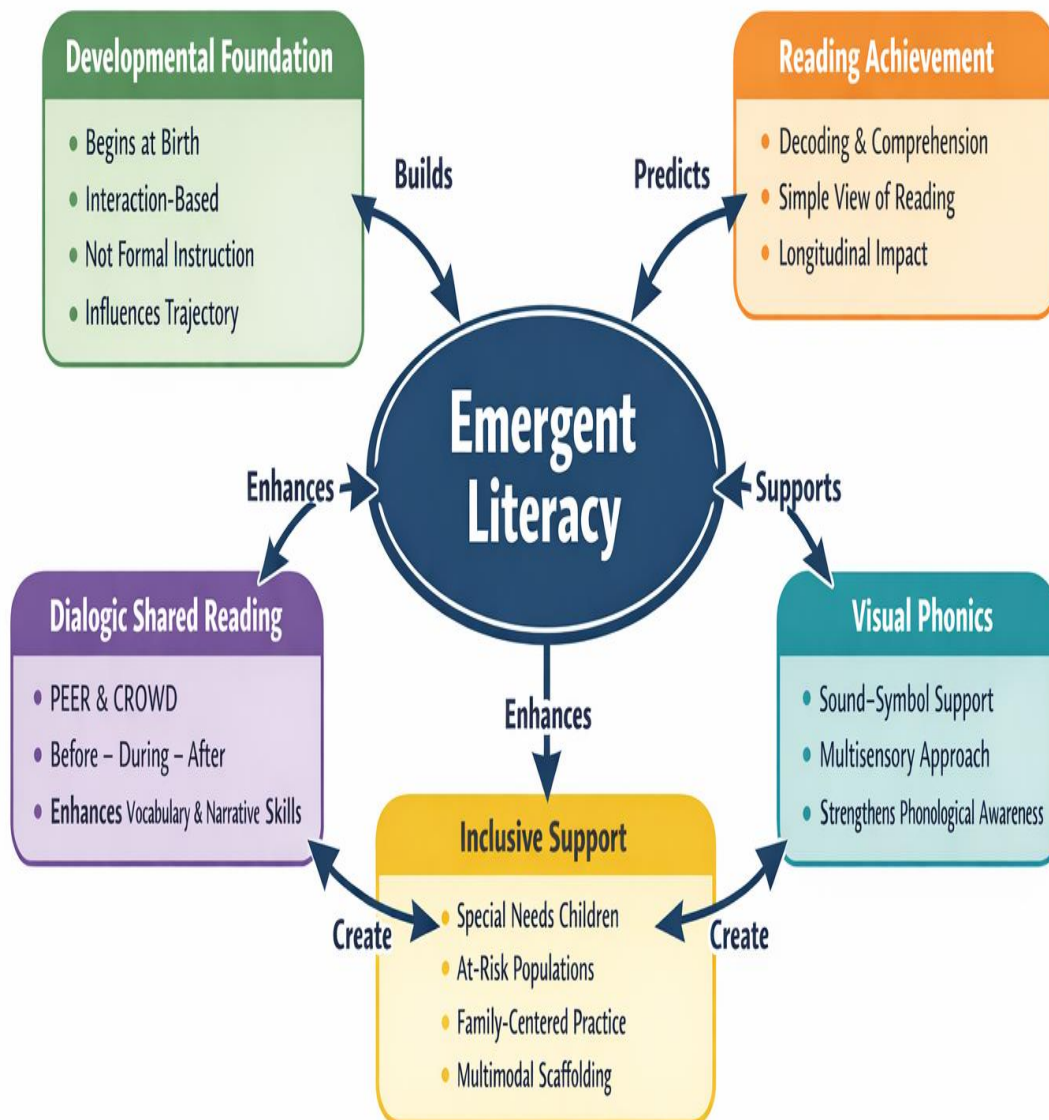
- After studying this unit;
 - Explain what emergent literacy is and how it develops
 - Describe why emergent literacy skills are critical for later reading success
 - Identify key emergent literacy skills
 - Recognize the early literacy needs of children with special needs
 - Apply dialogic shared reading strategies to promote emergent literacy development

THE SPECIAL EDUCATION COURSE BOOK FOR CAREGIVERS

Ayşe Nur Kart,
Ph.D.

Mehmet Kart,
Ph.D.

UNIT NO: 8



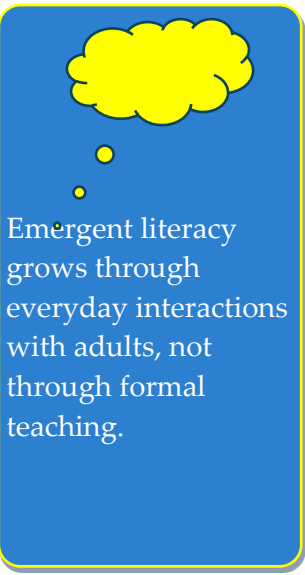
8 EMERGENT LITERACY AND DIALOGIC SHARED READING

8.1 INTRODUCTION

Literacy learning starts when children are born, through everyday interactions with their families or caregivers. Emergent literacy is set of skills, knowledge and attitudes that support young children learn to read and write well. Studies consistently indicates that children who begin school with sufficient emergent literacy skills are more likely to be successful readers in later years. Families and caregivers play a significant role in supporting emergent literacy development, but they do not have to be experts. Doing simple things like reading stories, pointing to words while reading, singing songs, or asking questions can make a big difference. These simple interactions not only foster a love for reading but also help build essential language skills. By creating a rich literacy environment, caregivers can set the stage for lifelong learning and curiosity.

This unit is designed to guide caregivers of children with special educational needs. It explains what emergent literacy is, why it's important, and how it can be supported through meaningful interactions in daily routines. Dialogic Shared Reading (DSR) is an evidence-based practice that actively includes children in conversations around books, and visual phonics (VP) is a multisensory method that employs hand cues to make speech sounds more accessible. Together these evidence-based methods support a wide range of learners by helping children connect spoken language and print in meaningful ways. Caregivers are encouraged to view themselves as the child's first and most influential literacy partners because they can help the child build emergent literacy skills.

8.2 EMERGENT LITERACY



Historically, literacy defines as the ability to read and write letters, words, and sentences, and that is typically obtained through formal education (Snow et al., 1998). Emergent literacy, on the other hand, emphasizes the developmental foundations of conventional literacy skills that appear long before children can read text on their own. A child in the emergent literacy stage might not be able to read words yet, but they might do things that are related to reading, like holding a book the right way, recognizing letters, or pretending to read by telling stories from pictures. Therefore, emergent literacy refers to the initial knowledge, skills, or attitudes that

support literacy development before formal education (Whitehurst & Lonigan, 1998). Children develop emergent literacy skills from birth through the age of five or six, collectively establishing the foundation for later literacy achievement (National Early Literacy Panel [NELP], 2008).

Emergent literacy is not a structured educational curriculum or a sequence of activities aimed at teaching reading (Justice & Pullen, 2003). Instead, it is a process of growth that happens naturally when adults and children play, talk, and do things together (Dunst et al., 2007). For example, a toddler pretending to read a picture book or a preschooler drawing shapes and calling them "my name" shows that they are beginning to understand print, symbols, and how to talk to people (Justice & Ezell, 2004). Through these experiences, kids start to understand that symbols mean something, books tell stories, and print is a way to share ideas (Snow et al., 1998).

These initial experiences have significant importance for children raised in institutional or high-risk environments, when chances for consistent and responsive adult engagement may be restricted (Şepitci-Sarıbaşı & Tezel-Şahin, 2024). For children who have faced neglect, inconsistent parenting, or developmental delays, such interactions are not only beneficial but essential for significant progress in language and literacy (Justice et al., 2016). Research demonstrates that responsive,

relationship-focused interventions designed to improve early language and literacy abilities can alter children's developmental pathways, especially for those displaying delays and difficulties (Roberts & Kaiser, 2015).

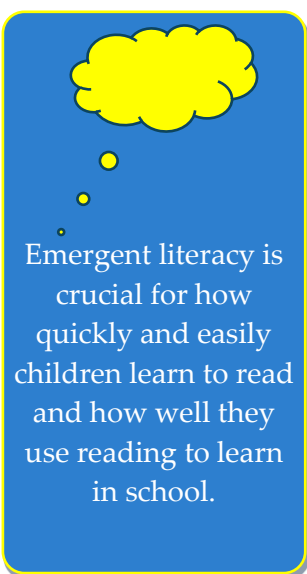
8.3 EMERGENT LITERACY AND READING ACHIEVEMENT

Emergent literacy is crucial for how quickly and easily children learn to read and how well they use reading to learn in school. Research indicates that early language

proficiency, code-related skills, print awareness, and interest in books serve as foundational elements for subsequent reading success. These skills influence both educational achievement and the motivation to learn (Torppa et al., 2022). This is why the early years are so important for literacy development through responsive interactions with adults.

Reading models emphasize that proficient reading requires the use of multiple skills. The Simple View of Reading explains how early reading skills lead to later reading success (Hoover & Gough, 1990). This method shows that reading comprehension comes from both recognizing words

and understanding language, and both are important for reading development (Lonigan et al., 2018). Phonological awareness and letter knowledge help children to better recognize and decode words. Furthermore, vocabulary, oral language, and narrative competencies enhance comprehension (Inoue et al., 2020). From this viewpoint, early literacy experiences facilitate subsequent reading by enhancing children's word recognition and language comprehension, which collectively foster successful reading (Lonigan et al., 2018). When children receive assistance in only one of these areas, such as learning letters without significant language interaction or listening to stories without attention to print, their reading development may be inconsistent or unstable (Lenhart et al., 2022).



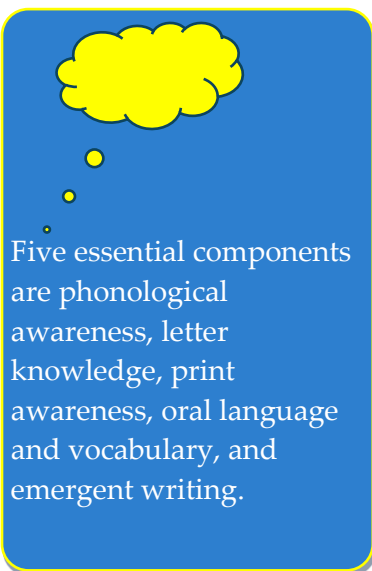
Early literacy has an effect that lasts long after the first few years of school. Longitudinal studies indicate that children who enter school with advanced early literacy skills generally achieve higher reading outcomes over time, whereas those with deficient skills are more prone to encounter difficulties (Stanovich, 2017). These initial disparities frequently expand as education advances. So, early language experiences have a big impact on what happens later (NELP, 2008). For example, children who hear more words when they're young are more likely to have bigger vocabularies and better comprehension skills, which help them do better in school (Noble et al., 2015). In conclusion, early literacy experiences have a lasting impact on how well kids do in school in general. Adults can help kids avoid long-term gaps in their learning. Therefore, early literacy is a wonderful way to help kids learn for life.

8.4 EMERGENT LITERACY COMPONENTS

Emergent literacy is a collection of skills that build on each other over time during early childhood and help children develop reading. Five essential components are

phonological awareness, letter knowledge, print awareness, oral language and vocabulary, and emergent writing (NELP, 2008). These five important elements work well together to make a strong and flexible base for building literacy. Caregivers may help kids with all parts of emergent literacy by talking, reading, singing, playing, and writing with them in ways that are appropriate for their individual needs. It is important to remember that kids learn differently from each other. For example, some kids may learn letters quickly but need more help with phonemic awareness, while others may be good

at speaking but not be very interested in writing. This means that caregivers need to take a balanced and responsive approach (Biggs et al., 2023).



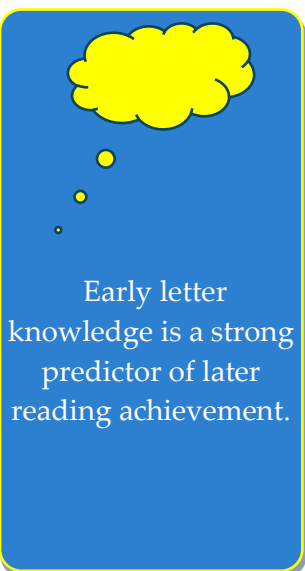
8.4.1 Phonological Awareness

Phonological awareness is the ability to hear, recognize, and change the speech sounds of spoken language. It includes skills such as finding rhymes, recognizing the first sounds, clapping syllables, and separating or combining individual phonemes (Kargin et al., 2015). Children usually notice bigger sound units, like words and syllables, before they notice smaller ones, like single sounds. This demonstrates a progressive evolution in their development (Rodríguez et al., 2015). This skill is commonly considered a core predictor of decoding and word reading because it enhances children's capacity for letter-sound correspondences when formal reading instruction begins.

Playful activities are better for phonological awareness than traditional instruction. Songs, nursery rhymes, rhythmic chants, and sound-based games naturally get children interested in the sound patterns of language. For children with limited auditory access to spoken language, phonological awareness can be cultivated by visual, tactile, and rhythmic aids, such as visual phonics hand cues or employing movement to signify sound patterns (Kart, 2022; Morrison et al., 2008). These allow children to learn about the structure of language that is easy for them to understand while also keeping the fun of early reading activities.

8.4.2 Letter Knowledge

Letter knowledge means being able to recognize the shapes of letters, learn their names, and gradually learn the sounds that they make. In early childhood, children



typically start recognizing letters that hold personal significance, such as those in their name, before progressing to other letters of the alphabet (Karaman & Aytar, 2016). Over time, this information supports comprehending the alphabetic principle that written letters are the representations of the spoken sounds (Kargin et al., 2015; Lonigan et al., 2018). Early letter knowledge is a strong predictor of later reading achievement (Inoue et al., 2020; Jimenez et al., 2024). Young children gain most from multimodal exposure to letters, such as manipulating magnetic letters, tracing letters with fingers, or constructing letters using everyday items (Birsh & Carreker, 2018; O'Brien et al., 2022). Visual supports, or VP cues, can further enhance the connection between letters and sounds in effective manners for struggling readers (Gardner et al., 2013; Kart, 2023).

8.4.3 Print Awareness

Print awareness, also known as concepts of print, means children's understanding of how print works and how it is used to convey meaning. This includes recognizing that print carries a message, knowing how to hold a book, understanding reading direction, and identifying basic book features such as titles or words separated by spaces. Children with well-developed print awareness understand that spoken words correspond to printed words and that reading follows consistent conventions, which helps them make sense of formal reading instruction later (Mol et al., 2009; Piasta et al., 2012). When adults point to words while reading aloud, read signs and labels in everyday settings, or invite children to handle books independently, they make print meaningful (Ergül et al., 2015). Exposure to print in multiple formats

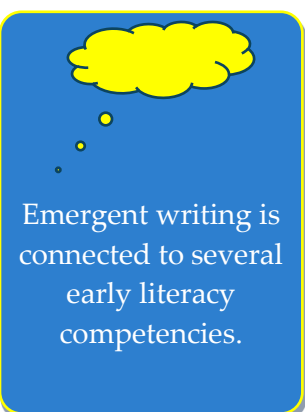
supports children's understanding that writing systems are tools for communication (Li & Tan, 2016).

8.4.4 Vocabulary and Listening Comprehension

Oral language skills and vocabulary development are the foundation for reading comprehension and written expression. These skills contain understanding and using words, forming sentences, and making sense of stories or conversations (Jimenez et al., 2019). A strong vocabulary in the preschool years is consistently associated with better reading comprehension in later grades, as children must understand word meanings to learn from text (Noble et al., 2015). DSR provides a particularly rich context for vocabulary growth because books introduce words, concepts, and ideas that may not appear in everyday conversation (Batista Rocha & da Mota, 2023; Mol et al., 2008). When adults pause to explain new words, ask open-ended questions, or encourage children to retell parts of a story, they actively support listening comprehension and narrative skills (Pillinger & Vardy, 2022).

8.4.5 Emergent Writing

Emergent writing is when young children start to write. Development starts with scribbles and sketches and gradually changing into shapes that seem like letters, made-up spellings, and words that are easy to understand. These early marks show children's understanding that writing is a meaningful way to communicate ideas, even if they can't write in the usual way yet. Emergent writing is connected to several early literacy competencies, as children utilize letter recognition and phonological awareness while exploring spelling (Neumann & Neumann, 2010). Giving children things to write with, showing them how to write while doing everyday things, and asking them to read their own writing all help them feel like what they are doing is important (Lust & Donica, 2011). Research demonstrates that early writing



engagement predicts future reading and writing proficiency, underscoring its significance within the broader emergent literacy framework.

8.5 EMERGENT LITERACY FOR CHILDREN WITH SPECIAL NEEDS AND AT-RISK POPULATIONS

It is important to recognize developmental and environmental risk factors early on because they can affect how well children learn to read and write. Children with special educational needs and those who grow up in at-risk situations because of socioeconomic or environmental risks often face difficulties to obtain literacy skills. Kids who grow up in at-risk situations may not have as many opportunities to have long conversations or read together, which can slow down their early vocabulary and print-related development. They are more likely to have reading difficulties if they don't get enough help in a timely manner. From an inclusive perspective, the objective of emergent literacy is not to wait until children demonstrate readiness but to provide the necessary scaffolds from the initial stages. Developmental differences can change how children learn new skills, but they don't stop them from learning. Children with disabilities may need more direct help and repetition.

For instance, children with hearing impairments may have limited access to spoken language, which could make it harder for them to learn new words and understand phonology. Research emphasizes the necessity of providing consistent visual and multimodal language input during daily activities to promote early literacy development in these children (Kart & Ayyıldız, 2025). Using signs and gestures and making clear connections between written text and meaning are examples of strategies that make language visible. These strategies help connect spoken language and literacy experiences. For children with visual impairments, emergent literacy development heavily relies on rich oral language, tactile exploration, and hands-on experiences. This shows that children with special needs

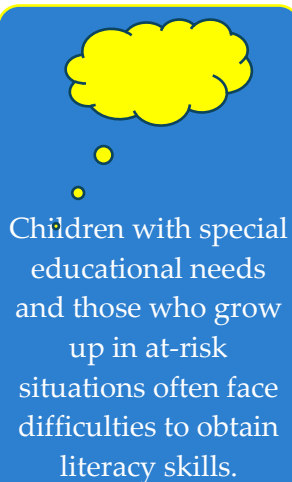
require materials and experiences that engage their senses (Li & Tan, 2016; Mol et al., 2009).

Additionally, studies indicate that Dialogic Shared Reading (DSR), when integrated with explicit phonological awareness and vocabulary targeted instruction, can improve language and early reading competencies in children with disabilities.

For example, children with speech and language difficulties can benefit from rich

linguistic input and diverse methods of instruction. This way, their limited verbal output would not stop them from taking part in literacy activities (Yorke et al., 2018). Additionally, many children with autism often have different literacy profiles. For example, some may be good at recognizing letters but not so good at paying attention to others or understanding stories. Research on how children with autism engage with books show that responsive caregivers, selection of books aligned with the child's interests, and participation in structured interactions can improve engagement and foster early reading skills (Bean et al.,

2020).



Children with special educational needs and those who grow up in at-risk situations often face difficulties to obtain literacy skills.

Early intervention enables caregivers to adjust routines, resources, and interaction styles while children remain highly receptive to new experiences. Family-centered intervention strategies that involve caregivers as active participants in children's literacy development are just as important (Akemoglu & Tomeny, 2021). Studies show that when caregivers use evidence-based strategies in their everyday routines, these methods can be very effective. Inclusive approaches help caregivers make early literacy practices a part of their daily lives. Early literacy support works best when caregivers improve how they use language and literacy practices throughout the day. This way, children with special needs and those who are at risk don't miss out on the foundational experiences that will help them read better later.

8.6 DIALOGIC SHARED READING (DSR)



Dialogic shared reading is a type of reading in which the adult purposefully gets the child involved in reading.

Dialogic shared reading is a type of reading in which the adult purposefully gets the child involved in reading. In this method, the adult reads less and listens more, which makes the child communicate about the book, events, and concepts (Whitehurst et al., 1988). The goal is to discuss the book, not to finish it quickly or test the child's knowledge. DSR is an evidence-based practice to help young children learn language and emergent literacy skills. DSR converts story time from a passive activity into a cooperative dialogue for children's active participation (Whitehurst et al., 1988). Research in various settings

indicates that DSR enhances vocabulary acquisition and comprehension, supports narrative competencies, and increases children's engagement with literature (Mol et al., 2009; Pillinger & Vardy, 2022). It is important to note that DSR is flexible and may be utilized with babies, toddlers, and preschoolers. It can also be changed to fit the needs of children with different developmental profiles. Caregivers from many different educational and socioeconomic backgrounds can successfully use DSR techniques to improve children's early language and literacy development (Huebner & Payne, 2010; Towson et al., 2021).



DSR has three stages: before reading, during reading, and after reading.

DSR supports multiple literacy skills at the same time. Children learn new words, practice sentence construction, improve their ability to tell a story, and improve their print related skills all in a fun and meaningful way (Batista Rocha & da Mota, 2023). DSR works best when people see it as a structured but flexible activity that happens in three parts: before reading, during reading, and after reading. Each phase has a different job to do to help children learn languages, understand what they read, and be interested in reading. Getting the child ready for the story before reading, helping the

conversation flow during reading, and making sure the child understands what they

read afterward all work together to make a meaningful and helpful literacy experience. The activity book that comes with this course book has detailed explanations, guided examples, and hands-on activities that go along with each phase. Caregivers can use these tactics in their daily DSR routines.

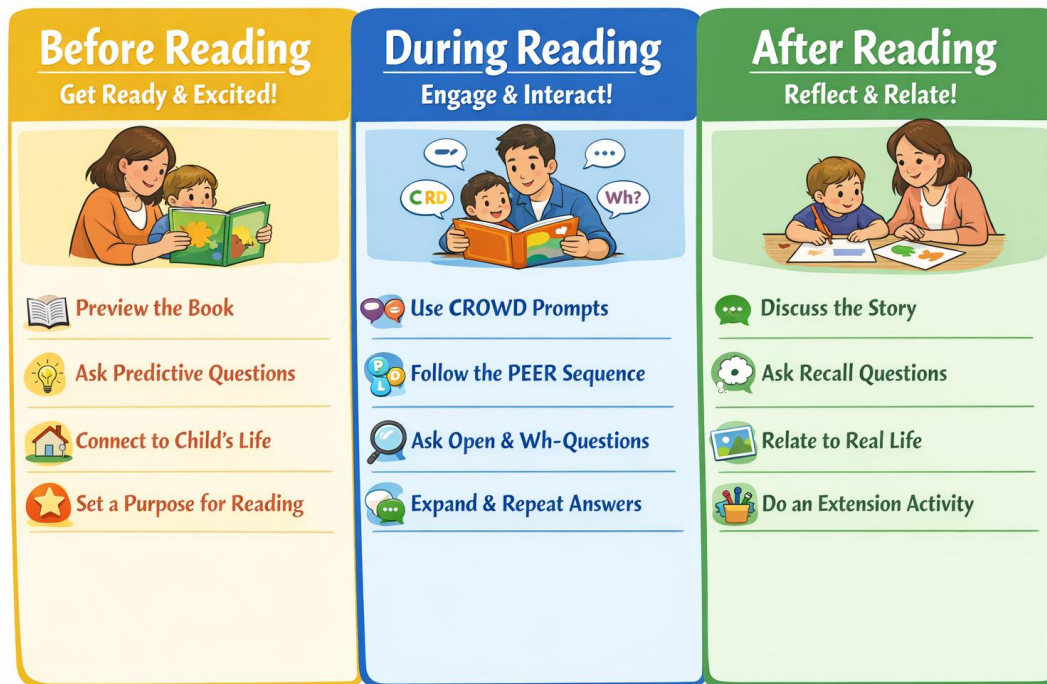


Figure 12. Stages of Dialogic Shared Reading

8.6.1 The PEER Sequence and CROWD Prompts

DSR combines two frameworks that work well together to assist caregivers in planning interactive reading: the PEER sequence and CROWD prompts. These tools are not strict scripts to follow; they are suggestions that support natural conversation during reading. The PEER sequence describes the flow of a brief interaction around a page or picture. First, the adult prompts the child to say something related to the book. Next, the adult evaluates the child's response in a supportive manner. The adult then expands the response by adding information or modeling richer language. Finally, the adult repeats or encourages the child to repeat the expanded language, helping consolidate learning (Huennekens & Xu, 2016). For instance, if a child says

“ball,” the adult may respond, “Yes, it’s a big red ball,” and then invite the child to repeat or build on that phrase.

CROWD prompts refer to five types of questions or cues that adults can use when prompting children. Completion prompts invite children to fill in a missing word in a familiar or repetitive sentence. Recall questions ask children to remember something that happened earlier in the story. Open-ended questions encourage children to describe something. Wh- prompts (who, what, where, why, how) guide children to attend to details and relationships in the story. Distancing prompts connect the story to the child’s own experiences, encouraging decontextualized language and the ability to talk about things beyond the here and now (Lever & Sénéchal, 2011).

These strategies are effective because they increase children’s active verbal participation during reading. When children are encouraged to produce language rather than only listen, word learning is supported, and comprehension becomes deeper and more durable. Caregivers don’t have to use every prompt on every page or follow the framework strictly. The strategies presented in Table 25 are intended as a flexible guide rather than a checklist. With repeated DSR experiences, caregivers often find that dialogic strategies become more intuitive and naturally integrated into their interactions with children (Mol et al., 2008; Whitehurst et al., 1988).

Table 25

PEER Sequence and CROWD Prompts in Dialogic Shared Reading

Framework	Component	Technical Description (What It Does)	Caregiver-Friendly Example
PEER Sequence	Prompt	The caregiver initiates interaction by inviting the child to comment on the picture or story, encouraging verbal participation.	<i>Caregiver: “What do you see on this page?”</i>
	Evaluate	The caregiver provides immediate, supportive feedback to the child’s	<i>Child: “Truck.”</i> <i>Caregiver: “Yes, that’s right!”</i>

		response, reinforcing participation rather than accuracy alone.	
	Expand	The caregiver models richer language by adding new information or vocabulary to the child's response.	<i>Caregiver:</i> "It's a big red fire truck."
	Repeat	The caregiver encourages the child to repeat or build on the expanded language, helping consolidate learning.	<i>Caregiver:</i> "Can you say 'big red fire truck'?"
CROWD Prompts	Completion	Encourages children to actively participate by completing familiar or repetitive sentences, supporting early expressive language.	"The wheels on the bus go round and ____."
	Recall	Supports memory and narrative skills by asking children to remember earlier events in the story.	"What did the bear eat at the beginning of the story?"
	Open-ended	Promotes detailed language use by inviting children to describe pictures or events in their own words.	"Tell me what is happening in this picture."
	Wh-Prompts	Directs attention to specific details, relationships, and causes within the story.	"Why do you think the girl is sad?"
	Distancing	Encourages decontextualized language by linking the story to the child's own experiences or prior knowledge.	"Have you ever felt scared like this character?"

8.6.2 Evidence-Based Benefits for Vocabulary and Narrative Skills

Research indicates that DSR substantially enhances children's vocabulary development. Meta-analyses show that DSR produces moderate to large effects on children's vocabulary growth, particularly when adults consistently scaffold children to talk and expand their responses (Logan et al., 2019; Mol et al., 2008; Mol et al., 2009). These effects are especially pronounced for children with language delays and

for those who have fewer language-learning opportunities in everyday environments (Ergül et al., 2017).

In addition to vocabulary, DSR helps children learn how to tell stories by teaching them how to understand story structure, remember events, and guess what characters are feeling and why they do what they do. Distancing prompts and recall questions help kids put information in order and say what they think in longer

conversations. These are skills that are essential for later reading comprehension and using academic language (Lever & Sénéchal, 2011; Pillinger & Vardy, 2022). When adults point out words, letters, or phrases that are repeated while reading, DSR also helps kids learn about print (Piasta et al., 2012).

Importantly, DSR has shown effectiveness across various demographics, including individuals with developmental disabilities and those raised in linguistically diverse settings. Studies involving children with autism, intellectual disabilities, and complex communication needs indicate that adapted interactive reading, utilizing visuals, gestures, augmentative and alternative communication (AAC),

or direct prompting, can improve engagement and emergent literacy skills (Hudson & Test, 2011; Yorke et al., 2018). These results show that DSR is not only a way to help kids read better but also a way to include all children and help them communicate and participate.



8.7 VISUAL PHONICS: A MULTISENSORY APPROACH TO LITERACY

Visual Phonics (VP) is a multisensory instructional system that represents the sounds (phonemes) of a language through systematic hand cues. Originally, it developed to support children who are deaf or hard of hearing. Over time, its use has expanded

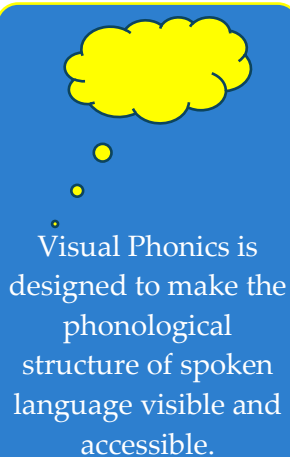
beyond its original population and is now widely applied with hearing children at risk for reading difficulties, including those with dyslexia or language-based learning challenges (Montgomery, 2008). VP was designed to make the phonological structure of spoken language visible and accessible. This feature is especially useful for children who are just starting to learn about sound-letter correlations and may benefit from having more than one way to learn (Kart, 2023; Montgomery, 2008).

Unlike letters of the alphabet, which bear no inherent visual relationship to the sounds they represent, VP cues mimic the articulation. Each hand cue is intentionally designed to reflect how a

sound is produced in the mouth, highlighting features such as place of articulation (where the sound is made) and manner of articulation (how the sound is produced). For example, plosive sounds are represented by brief, explosive movements, while continuous sounds are shown through flowing gestures. For example, the sound /p/ is produced when the air builds up behind the lips and then is let out all at once. To show the burst of air, the VP cue is to hold a fist near the mouth and quickly open the fingers when producing the sound.

8.7.1 Visual Phonics as a Bridge to Emergent Literacy

VP is essential for emergent literacy because it helps children gain phonological awareness and early phonics, which are two of the most important things they need to learn to read. Children need to be able to recognize, tell the difference between,



Visual Phonics is designed to make the phonological structure of spoken language visible and accessible.

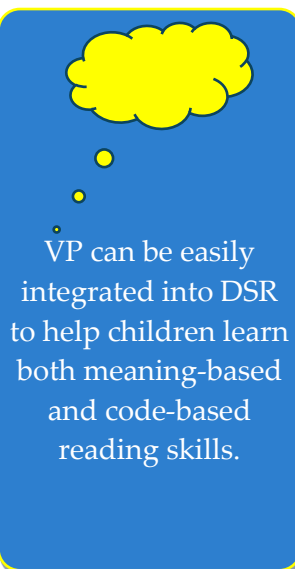
and change sounds in spoken language to have phonological awareness. VP provides an alternative access point for children who have difficulty hearing all spoken sounds or processing auditory information. Children can use visual and kinesthetic clues to tell how sounds are different from one another instead of only listening (Gardner et al., 2013; Trezek & Hancock, 2013). Adding a gesture to a sound makes memory stronger, helps motivation, and makes learning fun. It's important to note that VP is not a communication system or complete phonics instruction. Instead, it works with any method by making the link between sounds and print stronger.

8.7.2 Integrating Visual Phonics into Dialogic Shared Reading

VP can be easily integrated into DSR to help children learn both meaning-based and code-based reading skills. DSR focuses on narrative, vocabulary, and comprehension, whereas VP helps children hear sounds and decode them better. All these methods work together to produce a balanced multicomponent and multisensory literacy experience that helps children learn in different ways. One effective way to help is to teach a few target sounds before reading. Caregivers could choose a sound of the day that comes up a lot in the book and show the hand cue that goes with it. The

caregiver can point out the target word by pronouncing it, making the sound, and utilizing the hand cue when it comes up in the text or picture. For instance, when the caregiver sees the word "snake," they might repeat "snake," emphasize the /s/ sound, and trace the flowing hand motion that shows /s/. They can then ask the children to copy the sound and cue, which will help them become more conscious of phonology in a meaningful way. Caregivers don't have to cue every sound or word. It is enough to highlight one or two important ones on each page. This makes reading more enjoyable. Over time, children may start to apply the cues

on their own when they are trying to spell or decode words, making the system a self-support tool.



Caregivers can start by learning just a few signals for common sounds, especially vowels and consonants that happen a lot. Formal training is available and helpful, but families can start with just a few cues. Even limited use can make a meaningful difference in how children learn to read and write. Adding hand cues to DSR to support alphabet knowledge and early writing activities transforms sounds that aren't clear into actions that are clear and easy to remember. VP is most like how young children learn naturally: by seeing, moving, and interacting. This approach assists children who require additional support, while also ensuring that learning remains engaging for all students. In conclusion, VP makes sounds visible and touchable, which helps build a strong base for phonemic awareness and phonics. It also goes well with DSR practices that focus on language, meaning, and engagement (Kart 2022; Kart, 2023; Montgomery, 2008).

8.8 SUMMARY

Emergent literacy doesn't mean making kids learn faster or expecting them to read by themselves too soon. Instead, it means creating a print- and language-rich environment where children feel safe, curious, and confident. Emergent literacy development starts at birth and continues as young children interact with their caregivers every day. Children learn about print long before they start school by talking, playing, singing, and reading books together. In this chapter, we emphasized that early literacy is not just one skill but a group of skills that work together to make reading and writing easier later. Phonological awareness, letter knowledge, print awareness, vocabulary, oral language, and early writing are all important parts of this growth. These skills work together to help each other and are a strong indicator of how quickly children will learn to read when they start school.

Research consistently demonstrates that children who enter school with advanced emergent literacy skills, such as strong vocabulary knowledge, familiarity with letters and sounds, and positive attitudes toward books, are more likely to attain reading proficiency (Cabell et al., 2019; Sénéchal & LeFevre, 2014). On the other hand, children who commence school with insufficient early literacy experiences and skills are more likely to have reading difficulties (Rodríguez et al., 2015). These findings emphasize the critical importance of promoting emergent literacy during early years.

Additionally, this chapter discussed DSR as a strong, evidence-based approach to prepare children to learn to read. Caregivers transform reading into a meaningful conversation rather than a passive activity. Studies show that DSR activities greatly help children learn new words, tell stories, and understand what they read, while also making them more interested in and motivated to read (Batista Rocha & da Mota, 2023; Mol et al., 2008).

Inclusivity was another key message in this chapter. Every child can develop emergent literacy skills with appropriate support when provided based on their

developmental profile. For children with special educational needs, using VP as a multisensory strategy makes sure that literacy experiences are both meaningful and accessible. VP can help to improve alphabet knowledge and phonemic awareness by making speech sounds visible (Kart, 2023). Inclusive methods support the premise that differences in development don't stop literacy learning potential; they just require instruction that is flexible and responsive. In this way, caregivers set the stage for lifelong literacy, learning, and a love of books that will stay.

8.9 PROBLEMS

1. Emergent literacy is best described as:

- A) A set of school-only skills that begin when children learn worksheets
- B) A developmental foundation that begins at birth through everyday language, print, and interaction experiences
- C) A program that teaches children to read independently before age three
- D) A skill that develops only through letter drills and flashcards
- E) A stage that starts after children can write their names

2. Which everyday moment best reflects emergent literacy development in early childhood?

- A) A child completes a letter worksheet silently
- B) A child watches an alphabet video without adult interaction
- C) A caregiver and child talk about pictures in a book and the caregiver expands the child's words
- D) A child memorizes the ABC song without connecting letters to meaning
- E) A child repeats random words without context

3. Early literacy skills are critical for later reading success mainly because they:

- A) Guarantee that every child will read above grade level
- B) Replace the need for formal reading instruction in school
- C) Form the foundation for decoding and comprehension that later reading depends on
- D) Work only if children are taught to read early
- E) Matter only for children who already show interest in books

4. A key reason early gaps in literacy can widen over time is that children who start ahead often:

- A) Stop reading once they can decode words
- B) Practice reading more, build more vocabulary and knowledge, and gain

confidence

- C) Avoid books because reading becomes too easy
- D) Learn only through listening, not through reading
- E) Develop comprehension without needing vocabulary

5. Which option is the clearest example of phonological awareness?

- A) Recognizing the letter “M” in a child’s name
- B) Pointing to the title on the book cover
- C) Noticing that “cat” and “hat” rhyme
- D) Knowing what the word “enormous” means
- E) Holding a pencil with correct grip

6. Which behavior best demonstrates print awareness in a preschool child?

- A) Clapping syllables in “ba-na-na”
- B) Knowing that print carries meaning and that text is read left-to-right/top-to-bottom
- C) Using new vocabulary words in conversation
- D) Drawing a picture of a story character
- E) Making up rhyming words

7. When a child has limited access to speech sounds, the most helpful early literacy support is to:

- A) Reduce DSR and focus only on independent practice
- B) Increase drills and correct every mistake immediately
- C) Provide multimodal access (e.g., visual/tactile supports) so sounds and print become more accessible
- D) Wait until school begins because early support has little impact
- E) Avoid interactive conversation and only read the text straight through

8. A caregiver wants to support a child who has developmental differences and needs extra structure and repetition. Which approach is most appropriate?

- A) Keep reading sessions long and do not pause for responses

- B) Use brief, predictable routines with interactive prompts and supportive wait time
- C) Focus only on letter naming and avoid story talk
- D) Skip books and do only handwriting practice
- E) Stop reading if the child does not answer quickly

9. Which choice best matches the purpose of DSR?

- A) The adult reads quickly so the child hears more words
- B) The adult asks many test-like questions to check correctness
- C) The child becomes an active storyteller while the adult prompts, responds, and expands language
- D) The child listens silently to improve attention
- E) The adult focuses only on letter sounds during the story

10. During dialogic reading, which example shows the adult *expanding* the child's language?

- A) Child: "Dog." Adult: "Yes."
- B) Child: "Dog." Adult: "Dog."
- C) Child: "Dog." Adult: "Yes—this dog is running fast to catch the ball!"
- D) Child: "Dog." Adult: "Say it louder."
- E) Child: "Dog." Adult: "No, wrong."

Answer Key

1.B, 2.C, 3.C, 4.B, 5.C, 6.B., 7.C, 8.B, 9.C, 10.C

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