

Individualizing
in Early
Childhood:
The What,
Why, and
How of
Differentiated
Approaches

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Preschool

Differentiation Strategies for Exceptionally Bright Children

WHILE THE CHARACTERISTICS and behaviors of exceptionally bright children can vary widely, at the core these are the children with an unusual ability to focus on the tasks and topics that capture their interest. The term *exceptionally bright* applies to children who have already mastered all or most of the learning outcomes of your standard curriculum or who have passed most of the developmental benchmarks well in advance of the target time line for their age. An exceptionally bright child might seem smart in a traditional academic sense, like the 5-year-old who enjoys reading the dictionary. An exceptionally bright child might reveal his talents in surprising and unconventional ways. The child

who is able to mimic his teachers with startling and unnerving accuracy or the one who spends an hour stacking buttons into careful piles, using a sorting system that only he seems to understand—these are also children with exceptional talents and abilities.

Challenging exceptionally bright children in a general preschool or pre-K classroom requires differentiation. To differentiate means to adjust or change to meet the individual needs of each child. The term *differentiation* is frequently used in the field of gifted education as a primary strategy for challenging academically advanced students in a regular classroom. In early childhood education the term *differentiation* is used less frequently. This may be because we early childhood educators more than likely have a

background in child development, and we already approach our work with the assumption that teachers must make adjustments for the individual needs and varied developmental stages of each child. With this understanding, the individualizing of our interactions with children, in accordance with their abilities, temperaments, and interests, is so fundamental it hardly needs a label. We individualize every day, especially in the caregiving, the conversations, and the social interactions we have with children, from helping them put on their shoes to serving them snacks.

However, early childhood teachers often need guidance and suggestions for incorporating differentiation in curriculum planning and implementation. For example, creating one single curriculum plan for the whole class is common practice among preschool and pre-K teachers. These plans are usually not differentiated or they may only be differentiated to meet the needs of the children who are struggling, not the children who are advanced and have already met the goals of the lesson.

Differentiation in action

Here I present possible differentiation strategies used in gifted education and discuss how these strategies might be used in an early childhood classroom, using the example of one pair of pre-K teachers, Claire and Beth, and their experience teaching a unit on pets to their class. As Claire and Beth begin planning their curriculum unit on the topic of pets, they have identified two learning objectives for the unit that are aligned with their program's mandated early learning standards: Children will observe and describe characteristics and needs of pets, and Children will demonstrate, through play, how people take care of pets. Claire and Beth are aware that there are two children in the class—Maria and Nathan—who have already mastered these objectives.

Maria is exceptionally bright. She is a very verbal child who seems to have a lot of advanced knowledge in a variety of topics. She is beginning to read on her own and has a very sharp memory for the language of stories. One of her favorite books is *Doctor De Soto*, by William Steig, the story of a mouse who is a dentist. Claire and Beth have observed and noted that Maria is able to retell the entire story using a hybrid combination of decoding words and remembering. They have also had conversations with Maria about the content of *Doctor De Soto*. Their combined observations and conversations have led Maria's teachers to be aware of her extensive prior knowledge of animals and pets and how to care for them.

Nathan's father is a veterinarian, and their family has two cats and three dogs at home. Nathan has already learned a lot about pets because of his experience in his family. Although he is not necessarily exceptionally bright, he does have extensive knowledge on this particular topic.

Strategies for differentiating the curriculum

It's important to remember that, above all, curriculum must be meaningful to young children. The richest learning takes place when children can make meaningful connections between the new information and ideas they are learning and the experiences and knowledge that are already familiar and important to them. This means that when we set out to differentiate our curriculum and look for ways to challenge exceptionally bright children, we can use their prior knowledge, experience, and interests as starting points and build from there.

So, as one example, we can assume that this curriculum topic will be very meaningful to Nathan. Once the unit is

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under way and the children begin developing questions about animals and how to take care of them, Nathan could be asked to deliver the class's questions to his father and ask him for help in answering them. His father could also be invited to visit the classroom. By giving Nathan the role of asking for his father's help with the class's research, the teachers are making a connection with what Nathan already knows and what is important to him. They are also creating opportunities for Nathan, and for all the children who have met Nathan's father, to learn about animal care in a meaningful context.

Use an inquiry process

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Children's big questions can be used to shape the curriculum and the decisions we make about what to teach and when to teach it. In the case of Beth and Claire's pet unit, suppose Nathan is playing pet hospital in the dramatic play area and a child brings a toy horse to the hospital.

About the Author

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Nathan says, "First we have to weigh him." He puts the toy horse on the scale and comments, "If this was a real horse, he wouldn't fit on this scale."

Beth talks with Nathan about what she observed, saying, "You are right about real horses. They're too big to fit on such a small scale."

Nathan asks Beth, "How do animal doctors know how much horses weigh?"

"That's a great question," says Beth. She writes down Nathan's question and tapes it up on the wall of the classroom. "Nathan, how are we going to find out the answer to your question?"

"We could ask my dad," says Nathan.

"That's a good idea," says Beth. "Let's do that. What are some other ways we could find out?"

Beth helps Nathan make a list of possible strategies that include "looking in a book," "calling someone who has a horse," "going to a store that sells really big scales," and "visiting a horse farm." As Beth and Nathan work on this list, several other children become interested in Nathan's inquiry. Nathan's question becomes a small project that involves a group of children over the course of several weeks.

These conversations could lead to an emergent curriculum unit or to a small-group investigation concerning concepts of size and weight. The idea that children take an active role in generating and answering their own questions is an effective strategy for differentiating the curriculum in ways that will give exceptionally bright children a meaningful challenge.

Increase complexity

Beth and Claire, in teaching their unit on pets, prepared to teach concepts and information about animals at a level appropriate for most preschool children. How do they make these concepts more complex for children like Maria and Nathan?

A helpful tool for measuring the complexity of the concepts and experiences we are providing for children is Bloom's Taxonomy (Bloom 1974). The taxonomy is a tool to help teachers define learning objectives that promote higher-order thinking. By *higher order* we mean thinking with increasing complexity and creativity. Bloom's Taxonomy, as revised and updated by Lorin Anderson and David Krathwohl (2001), has six levels, with the first level representing the least complex thought and each level thereafter involving greater thought abstraction and sophistication:

1. Remembering
2. Understanding
3. Applying
4. Analyzing
5. Evaluating
6. Creating

Bloom's Taxonomy can be used to make sure a curriculum plan is challenging children at every level, to benefit not

just the exceptionally bright children but all the children. To illustrate, consider how Beth and Claire could use Bloom's Taxonomy.

1. Remembering. During the "morning meeting," Claire and Beth ask questions ("What kinds of animals make good pets?" "What does a veterinarian do?"). When children answer these questions, they are restating information they learned through their own experience, books, and discussion.

2. Understanding. When Claire and Beth invite children to dictate a story at the literacy table, the stories the

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children tell about pets demonstrate their understanding of what pets need and how people take care of their pets. When a child dictates, "I have a cat named Cheezits. We give her food in a dish on the floor," she is demonstrating her understanding of pets and their needs.

3. Applying. During free play, a few children are building a structure out of blocks. Beth observes their play and then asks, "What are you building?" One of the children replies, "A store." Beth asks, "What kind of store are you building?" The child answers, "We don't know yet." Beth recognizes this as an opportunity for children to apply what they have been learning about pets to their block play. She gently suggests, "I wonder if you could make it a pet store." The children seem to like Beth's idea. They use the blocks to designate different spaces for different kinds of pet products, such as cages for birds. Their play demonstrates what they have learned about pets through stories and discussion and how they are applying it to something new, constructing a pet store.

4. Analyzing. One way that children analyze new information is by comparing one thing to another. At the games table, when children sort dog and cat counters, they are comparing cats to dogs. Claire asks the children questions that encourage this analysis. "How are dogs and cats the same?" she asks. One child responds, "Dogs and cats both have tails, but cat tails don't wag." An exceptionally bright child may need the challenge of comparing a greater number of variables, for instance, textures of fur or ability to swim.

5. Evaluating. In the dramatic play area, where the children have created an animal hospital, some children want to pretend to be cats and others want to pretend to be dogs. In deciding which role to take on, they are evaluating the roles. Beth asks them questions that challenge them to



evaluate the choices they made. "Why did you decide to be a cat?" Maria responds, "Cats don't have to go outside in the winter. They can pee-pee in a box. I want to stay cozy, so I'm a cat." Her answer reflects an evaluation of the benefits of the role of a cat.

6. Creating. As the pet unit progresses, Beth and Claire continue to invite children to dictate stories at the literacy table, encouraging them to create stories about imaginary pets. Stories of fiction or make-believe demonstrate ways that many of the children are taking in a variety of information and ideas about pets and creating something new. ("Once upon a time there was a dog world where only dogs could be. Everybody barked at each other. Bark! Bark! Bark! No one could ever talk, but they all knew what to do.")

After using Bloom's Taxonomy to look at their pet unit, Beth and Claire can be more intentional about creating learning experiences at every level, from the most simple to the most complex.

Strategies for differentiating teaching practices

Two of the best teaching practices that will help you differentiate to challenge exceptionally bright children have to do with how you group children and how you pace the curriculum and activities.

Create flexible groups

One important differentiation strategy is creating flexible groups. This means that teachers create groups based on children's interests *and* their abilities. The groups are called "flexible" because they are temporary. There is an

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understanding that abilities and interests shift and change rapidly and that children should not be "tracked" by having to stay in the same group assignment over a long period of time.

So, for example, in the pet unit, Beth and Claire may want to create a flexible group of advanced learners in order to present the children in that group with more challenging activities, materials, or conversations. Beth and Claire may decide to divide the whole class into flexible groupings, or they could create a hybrid configuration

incorporating both choice activities and flexible grouping. A flexible group could be made up of Maria, Nathan, and Rashaad, another child who has demonstrated in his play that he already knows a lot about animals but doesn't yet have the vocabulary and language development to express what he knows. Grouping Rashaad with Nathan and Maria will benefit Rashaad because he will be exposed to Nathan's and Maria's advanced language skills. The grouping will also benefit Nathan and Maria because Rashaad has knowledge, ideas, and questions about animals that will be new to them. Beth could meet with these three children at the literacy table and work on a special project together, such as creating a book that lists and describes different breeds of dogs.

Adapt the pace

Another way to differentiate teaching practice is to play with time. You can adapt the pace of a specific activity or adapt the pace of a whole curriculum unit. A faster pace to an activity such as a game challenges students by demanding greater expertise and faster thinking. A faster pace to a curriculum unit means more information and concepts are covered over a shorter period of time, preventing boredom and maximizing learning.

In the case of the pet unit, Maria and Nathan would be allowed and encouraged to move on from the pet activities

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involving dogs and cats and begin to learn about more exotic pets, for instance, birds and reptiles. If Maria or Nathan appear to fidget and seem bored during a class discussion about dogs and cats, they could be allowed to sit off to the side and look at picture books related to other pets.

Sometimes slowing the pace can add challenge too, if it means adding more depth and detail to an activity or cur-



riculum sequence. Suppose Maria visits the literacy table and Claire notices that Maria has written the letter C at the top of one page and is drawing a picture of a cat. Claire comments, "Maria, this page reminds me of an alphabet book, with one page for each letter of the alphabet. Would you be interested in making your own alphabet book?" Maria exclaims, "That's a great idea! I want to make an alphabet book about pets!"

Claire helps Maria make a plan for her book by setting aside 26 pieces of paper and showing Claire how to label each page and staple the papers together. When it's time to clean up, Maria begins to cry. "But I'm just getting started!" she exclaims. "I'll never have time to finish my alphabet book."

Claire lets Maria continue working on her book a few extra minutes by asking her coteacher, Beth, to call Maria last for washing hands for snack. Claire also gives Maria a special folder for storing the pages of her alphabet book. During snack time, Claire has a conversation with Maria

about how much time she will need to finish the book, creating an impromptu math lesson.

Over the next two weeks, Maria not only continues working on her alphabet book but also monitors her progress by using a tally sheet to count the number of pages she's completed each day. Claire has differentiated her teaching practices to create multiple learning opportunities that challenge Maria as well as the other children in the class by having the opportunity to observe and interact with Maria.

Strategies for differentiating the learning environment

How we set up our learning environments, including how we present and organize the materials in the classrooms, can also play a key role in differentiation to meet the needs of all the children and to challenge especially bright children.

Offer choices

When children make their own choices, we can be confident that the learning experiences are aligned with their interests. Choices allow children to take a more active role in their own learning because the decision-making process engages them and increases their sense of responsibility for what happens in the classroom.

One of the best ways to offer choices to children is to create learning experiences at centers and invite children to choose which center they want to visit. For the pet unit, Claire and Beth might use the existing areas of their pre-K classroom—the literacy corner, the block area, the dramatic play area, the games table—and create pet-related activities in each area that in some way utilize the materials and activities already available there. Or they might create

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temporary centers, perhaps at tables or on the floor, that are specific to just this pet unit.

Choice works best when there are very broad time limits for each activity. For example, if children are made to change or

rotate through centers every 20 minutes, they are not really being given an authentic choice. Ideally, if a child makes a choice to pursue a specific learning experience, that decision is respected by allowing the child to stay in that area as long as her attention is held (within reasonable limits). With this in mind, Claire and Beth plan for four different centers that will introduce children to the unit.

For Maria and Nathan, being offered this choice is important for several reasons. The decision-making process will demonstrate to their teachers what direction to take

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their learning. Maria, for example, chooses the literacy table. Even though she already has advanced literacy skills, her choice shows that she wants to continue to deepen and expand her ability to understand and tell stories. Nathan, who chooses the games table rather than the animal hospital, demonstrates through his choice that he is interested in new, unfamiliar concepts. His focus seems to be on exploring new math concepts as they relate to a familiar topic, pets.

Adapt the materials

There are three primary ways we can adapt the materials: we can add something, we can take something away, or we can replace materials. Any of these three options can increase the level of challenge.

Add something

Say that Maria, who already knows how to count to 10, chooses to visit the games table. The materials available at that table include:

- a small table with several sets of counters, small plastic toys in three colors (blue, red, and yellow) shaped like dogs and cats
- a stack of oversize graph paper (one-inch squares) and markers in a basket
- a laminated numeral chart showing the numerals 1 through 10

What could you add to this table to extend Maria's learning and challenge her to count beyond 10? One option would be to increase the quantity of counters, taking care to make sure there were at least 25 of each animal. Another

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option might be to add a piece of equipment that would challenge Maria to count to 10 in other ways, for instance, with an abacus, a ruler, or a calculator. A teacher could present these materials to Maria in a mini-lesson with one-on-one instructions for how to use the equipment. Or they could be offered in an open-ended, exploratory way. "Here's something that helps people count. Can you think of ways people might use it?"

Take something away

Sometimes the best way to make a task more difficult is to take something away. The children are challenged to accomplish the task with less material or information and they need to think creatively, making connections and drawing conclusions in order to finish a task.

In the case of Maria at the games table, the removal of the laminated chart would challenge her to remember and

order the numerals on her own, without a model. By the same token, if Maria visits the literacy table, taking away the pet books, which serve as examples and inspiration for the children, might help challenge Maria to come up with her own ideas, and to recall and apply her knowledge of letters and words without having the model of the books for reference.

Replace the materials

Another way to adapt the materials is to replace the materials with something entirely new. At the literacy table, a computer and keyboard could replace writing materials, and Maria could be invited to type her stories instead of writing them. Replacing materials with other items would probably not be a routine decision, only an occasional accommodation for a child who has truly exhausted all the possibilities of learning from the materials that are already available. If an exceptionally bright child is offered alternative materials and other children express an interest in using those materials too, this would be a great opportunity for the exceptionally bright child to demonstrate what he knows and socialize with another child by helping to introduce that child to the new materials.

Conclusion

Giving all children the chance to learn and achieve to the very best of their ability is a worthy mission for any early childhood program; it is our job to support the learning and development of every child, with an understanding that each child has different strengths and needs and each child develops at a unique pace. When exceptionally bright children are supported and challenged, the result is children who are confident about their abilities to think and learn, who are excited about school, and who make creative contributions to the classroom community.

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