

How Infants and Toddlers Think and Feel: What the Research Tells Us, Part 2

Beth Zack: Good afternoon, and welcome to Baby Talks. We're so happy to have you here with us today. Baby Talks is a series of webinars that we hope will be helpful to everybody who works with young children. Our main audience, however, are teachers, family childcare providers, and home visitors working with infants and toddlers and their families in Early Head Start, Migrant and Seasonal Head Start, and American Indian and Alaska Native programs. These webinars are designed especially for you to introduce you to research around infant and toddler development. My name is Beth Zack, and I'm here with my colleague, Dawson Nichols.

Dawson Nichols: Hello. Beth and I are from the National Center on Early Childhood Development, Teaching, and Learning. We are based at I-LABS, the Institute for Learning and Brain Sciences, here at the University of Washington in Seattle. I-LABS is a partner organization with NCECDTL, and it is one of the leading infant research centers in the country.

Beth: Yes. This episode is the second in a three-part series. We're examining the first three years of life from the child's perspective. This episode is focusing on that second year of life from about 13 to 24 months. If you didn't catch that first episode, not to worry. You can watch it on the Early Childhood Learning and Knowledge Center, or the ECLKC. This episode also works on its own. Each episode covers interesting and important research and offers research-based strategies and techniques that will help you in your work with children.

Dawson: Yes, and that is true of all Baby Talks, of course. This series, though, is a little different in that it encourages you to see and feel and taste and smell the entire world from the child's perspective. We created this series with the conviction that understanding how children experience the world can help us in our work with them. When we see the world the way the children see it, when we empathize with their experience, we're in a much better position to understand how they go about learning and how we can help them learn.

Beth: Well put.

Dawson: Well, thank you.

Beth: I think you got it all. In our last episode, we talked about how research is helping us understand what babies are thinking and experiencing. We know now more than we ever have before about how their senses develop and how they're learning about the world around them.

Dawson: Yeah. Remember, from the very beginning, we talked about how babies have this connection with people. They learn best in social situations.

Beth: Yes. In that first episode, we introduced three principles of development. We're going to go over them again today, because they don't just apply to those first 12 months. They apply to this second 12 months, too, and that's our topic today. Let's look at those again. They're also written in your Participant's Guide for you to refer to. We have, I am fascinated by people, and I readily learn from them. I learn through experience, and I need help getting access to the things

that will help me learn and grow. And I need help navigating change and regulating my emotions.

Dawson: I'm so glad that we're carrying these principles forward, because it is so true that they apply. It's nice to have a first birthday, but it is not as though a child steps through a door and becomes a different child on the other side of that. Not at all. Development is gradual and unique to every child. The things that help an 11-year-old develop and grow are also going to help a 13-month-old grow and develop, as well.

Beth: People that are working with family childcare programs – you guys are on here today – you're especially in tune to this because you're working with kids of all ages, sometimes babies and preschoolers at the same time.

Dawson: Yes. Shoutout to family childcare folks.

Beth: I second that. You know that effective practices for children under one are also effective for older children. Now, obviously, we need to adjust as children grow and their interests and their abilities expand and change, but these principles are consistent. Today, we're going to talk about new practices, but these principles, they're going to carry along with us.

Dawson: Let's also remember that children, they do develop in typical patterns, but again, every child is unique, and so they're going at their own pace. They have different interests, different abilities. They develop skills at different rates, so we're going to talk about typical changes during the second year of life, 13 to 24 months, but how and when a child builds these skills is going to be individual, and it's dependent on experiences, different temperaments, different caregivers.

Beth: Culture, language, environment.

Dawson: And family and, of course, relationships.

Beth: Yes, relationships. Relationships are key to learning during that first year. It is true, again, many children, they're learning to walk, they're developing more complex relationships, and they're learning to communicate more effectively. There is a lot happening, but most of it is still learned from the adults in their environment, right? They're taking their cues from us.

Dawson: Yes. This is one of those places where I think it's helpful to look from the child's perspective. I am living in this tremendously complicated world. It's complex. I don't know how most of this stuff works, but there's these wonderful examples walking around – adults. If I watch them, I can learn so much from them. They're so useful for learning new things, especially when I can trust that they are going to meet my needs. That allows me to concentrate on what they're doing and learn from them.

Beth: They're learning from us all the time, and they're only getting better at it this year. That imitation from the first year, well, now they're imitating more complex things. But let's not get ahead of ourselves, I want to introduce our learning objectives for today. Again, we'll be looking at the second year of life from the child's perspective to give you a feel for children experience the world. We're going to focus on these areas. First, we're going to identify strategies 13- to 24-month-olds use to learn about people and the world, and we're also going to explain practices that promote learning and development during the second year.

Dawson: I want to start with an overview of that development. I think looking at a video from a home visit will help us do this. This is one of those times when I would say look in your Participant's Guide. The different learning domains in the ELOF are listed on the left-hand side in the section dealing with this video. When you see the child in the video, I would encourage you to write down, what kind of activity is the child engaging in that is in this particular domain? See if you can identify something in each of the domains as you watch the video.

Beth: Just a quick note, this video is in Spanish, but I think you're going to be amazed by how much you can pick up from this interaction, even if you don't understand the language.

Dawson: Absolutely. Here we go.

Beth: Let's do it.

[Video begins]

[Women speaking Spanish]

Woman 1: Thank you! Look, look, your mommy wants some.

Woman 2: I want some, Hazel. Here, here in this little dish. Come here.

Child 1: Dish.

Woman 1: She's going to serve.

Woman 2: Yes.

Woman 1: Ah! There is nothing. There is nothing. Ah! Now there is, thank you!

[Video ends]

Beth: Oh, my gosh. There is stuff happening in every domain, such a busy year. Dawson, what examples did you find from the ELOF?

Dawson: I was thinking of it from her perspective, so let me talk about it that way. I'm exploring with all of my senses, and I'm exploring how my body moves and moving things around. That is perceptual, motor, and physical development, of course. As I'm doing that, I'm having these positive interactions with the adults that are here, social and emotional learning. I don't have a lot of words yet, but I am listening, and I'm understanding, so I've got some communication going on there. I'm exploring early math concepts – the weight, volume, feeling, and dumping. There's cognition in there. I'm a little scientist. I'm doing these experiments, and I want to do them again and again. It does fulfill all of these domains almost all at the same time. How much can I get in the bowl with my hand, and what kind of creativity can I do here? That's approaches to learning. I would like to mention that I've probably done this before and I'm remembering how I did it from last time, so I'm flexing my memory muscles, too. There's all sorts of learning going on here.

Beth: Memory isn't really a muscle, right?

Dawson: OK, it's a metaphor, but muscles improve with practice, and so does memory. As I experiment, I'm learning more, I'm remembering more, and I'm also learning other skills. I'm becoming better at focusing my attention. I'm building up more and more curiosity. Look at all

of these interesting things in the world. It's this big, wonderful place, and I'm exploring and learning about it as I do.

Beth: So much to explore and learn. In today's webinar, we're going to be concentrating on language and social and emotional learning. Why? Well, unfortunately, we only have an hour with you all. I also want to have you look at this chart on the sequence of development. This will be familiar to you if you joined us for the last Baby Talks. Last time, we talked a lot about that sensory and physical development, and that's because they developed first. Now, in the second year, those systems are developed enough to support language. All language production is physical, whether we're talking about spoken language, sign language, or even our body language. There's lots of muscles that are involved, and now, children have had a whole year of practice. During that time, they've also strengthened those neural pathways between the language regions in their brain. By month 13, they are ready to start communicating, if they haven't already. It really gets going during this time.

Dawson: I would add, from the child's perspective, it's sort of easy to see why it's happening this way. I've had 12 months of experience, and now I'm starting to get up. I'm starting to move around a little more, gaining some independence. I'm starting to realize just how powerful this communication thing is. I can learn so much. As in the previous webinar, again, there's this special focus on other people from the very first moments of birth. As I'm developing this communication, I'm developing more relationships, deeper relationships, especially with the trusted and supportive adults in my life. I realize more and more how much they have to teach me, and I can watch them doing these things. These adults are so full of information, and the more I communicate, the more I can benefit from that information that they have.

Beth: Right. And they communicate with us because they love us, too, right?

Dawson: Yes, of course, and we love them.

Beth: We do.

Dawson: Of course we do, but the adults have so much useful information, and that's what I'm concentrating on right now, because your children recognize that. At the very beginning of life, they have this impulse to pay attention to other people. Now, as they're developing and learning more and more, they're starting to intentionally pay attention to the adults in their life. It's becoming this intentional act, and children are so observant. They're really good at this.

Beth: They are. This makes me think about that food sharing study from a recent issue of Science. Did you read that one?

Dawson: Yes, Bring that in.

Beth: OK. There's a series of experiments that was done with hundreds of toddlers, and they were trying to see whether toddlers could distinguish kinds of relationships just by observing other interactions. In one experiment, a toddler watched, and there was this puppet, and it was seated between two research actresses. One of those actresses pretended to share an orange slice with the puppet, and the other actress shared a ball. Then, the toddler watches as the puppet acts in distress. The question is, who is going to help that puppet?

Dawson: He's crying. Who's going to comfort the puppet?

Beth: Exactly. Toddlers overwhelmingly looked to the actress who shared the orange slice to help, and it's like they seemed to infer from that interaction that that actress had a closer relationship with the puppet compared to the one who shared the ball.

Dawson: If I'm the child, I'm watching this interaction, and now I can see that, if you are willing to share food with the puppet, you're probably willing to help out when the puppet needs some comfort and cries.

Beth: Yes.

Dawson: But if you only played ball, well, you could just be a playmate, and maybe you're not as likely to help out as this other person.

Beth: Exactly. This is just one example of how children are learning from observing interactions with others, and something so subtle as this.

Dawson: I think it's so interesting. It's kind of amazing that it happens, but it's also kind of – of course. This is what they're learning. They're growing and developing these social and emotional skills at this stage. This is our first strategy. It comes right out of that first principle from last time, which was, I am fascinated by people, and I really learn from them. This is continuing, I'm getting better at it. I'm starting to realize how helpful this is, so it's not just an instinct anymore. Now, it is a tactic. I look at the adults in my life, and I learn from them.

Beth: Right. The important thing here is that we're not talking about instruction. This is learning through observation, through watching other people interact.

Dawson: Exactly. And again, from the child's perspective, I'm no longer just learning from direct interactions. I'm observing how you are interacting with other people, and I can learn that, too. Again, I'm a little scientist. I know about different kinds of relationships. They have different obligations, and I can know about your relationship with another person just by watching you interact with that other person. I'm getting to be a pretty sophisticated thinker here.

Beth: Sure are. I think this is a great place to introduce the emotional eavesdropping video.

Dawson: I love this video.

Beth: Me, too. It underlines how much children are learning from observing adults, only in this experiment, they were interested in toddlers, how receptive they are to the other people's emotions, and this includes emotions that aren't directed at the toddler themselves. For this experiment, they brought them into a room with their caregiver, and they played with toys with the researcher. The researcher showed the child something, the child got a turn. Pretty simple, right? They enjoyed this. After that pattern was established, another person entered the room, and that person didn't interact with the child, and they didn't play with them or anything.

Dawson: OK. Don't give it away, don't give it away.

Beth: Sorry. Getting ahead of myself. Let's just watch the video. I encourage you to use your Participant's Guide to jot down any notes.

Dawson: Pay attention to the child here and focus on the child's perspective. What cues is this child getting from the environment, and how does he respond to those cues? OK.

[Video begins]

Teresa: There's something inside. Can you see what's inside the box? You can take the lid off. Is there something in there? There's a green cone. You want to put it back inside the box? You want to put the lid back on the box and close it up? Can I see that? Thank you. Let's see what else we have. Look at this. See? Look at this. There.

Kelly: Hi, Teresa. I'm going to sit here and read a magazine.

Teresa: OK. That's Kelly. Kelly's going to sit and read a magazine. Kelly, look at this.

Kelly: That's aggravating. That's so annoying.

Teresa: Oh, I thought it was really interesting.

Kelly: Well, that's just your opinion. It's aggravating.

Teresa: Here. Can I see that? Thank you.

Kelly: I'm going to go now, Teresa.

Teresa: Kelly's going. Bye-bye.

[Video ends]

Beth: That child is so perceptive in that video.

Dawson: I know, and cute.

Beth: Yes.

Dawson: I want to acknowledge that it can be hard for some people to watch that, but we should tell you that the child did see that magazine-reading lady later, and they had a nice exchange after that, so it wasn't left on a bad note. We can remind ourselves that one interaction is never going to forever change how a child sees an adult. Thank goodness, because we all have those moments sometimes. It's OK. Children are statistical learners, they're going to learn through many experiences. It shows how perceptive children are to our emotions.

Beth: Right. This child – when I introduced the video, I said “emotional eavesdropping,” and that's what this child is doing in the video. He's seeing that emotion in another person, even though it's not directed at him, and he's changing what he does because of it.

Dawson: I know. Doesn't your heart go out to him? He wants a turn. He really wants to do that, but he doesn't want to make that lady angry, either.

Beth: I know, this is just such a wonderful example of learning about emotions through observation.

Dawson: I see what's happening and I understand at a deep level now. This is not just the mechanics of what's going on. I'm reading the emotions that these other people are having, and I'm learning how I can navigate this emotional environment as well.

Beth: Right. During the second year, children are becoming more sophisticated at understanding social situations and emotions, and understanding these things is important. I also want to recognize this child's amazing self-regulation. Self-regulation is a cognitive skill. It's

our ability to manage our emotions and our behaviors. He reads this emotional situation brilliantly, and then he controls his desire to play, which is huge. That's something that's really hard, and he's not going to be able to do this in every situation, because this is a skill that continues to develop across childhood.

Dawson: And adulthood.

Beth: Yes.

Dawson: It is a hard skill, but let's recognize, too, this is kind of the gateway to all of learning. As a child, most of what I am going to learn, I'm going to learn from other people. Understanding them through working with them and understanding their emotions is absolutely key to learning in every domain.

Beth: That's right, and it happens in unexpected ways, too. Children are learning to recognize different emotions, but also these complex social situations. There's this other study out of our home institute, I-LABS, that I want to bring up. They did it with one hundred 19-month-olds and their parents, and they brought them into the lab for a study on sharing. This was all pre-COVID, and what they did was they asked parents to bring their child's favorite toy, and then they secretly gave that toy to the researcher. The researcher's across from the child, and the researcher pretends that this toy slips out of their hand, and they cannot reach it. The question is, what is that child going to do? Are they going to be willing to give up that toy and hand it back, or are they going to hold onto their favorite toy for themselves? What they found was that many children were willing to share, even with the stranger.

Dawson: I love that study. A lot of people assume that toddlers are selfish. "Mine" is a word that comes out during these early years.

Beth: Yes.

Dawson: But often, toddlers are generous, even with strangers.

Beth: Right. We don't really see this in other animals, and scientists believe that these early pro-social behaviors like sharing are the building blocks for human generosity. It starts with recognizing that desire in another person.

Dawson: Yeah. Both of these video examples are wonderful examples of children becoming better at understanding social situations, reading people's emotions, and how people relate physically to one another. It reminds me of a study from a couple of years ago where 17-month-old children were shown to already have pretty sophisticated expectations about how sharing works based on the context in which the sharing was happening. These are 17-month-olds, and they can already understand that, sometimes, things get distributed equally, and sometimes, they don't, and both of those can be fair, depending on the situations. I might not have understood this in my first year of life, but this year, I'm starting to get it. I'm starting to understand it, and I want to know more about these different situations and these different contexts, so I developed these strategies to help me figure it out.

Beth: That brings us back to our first strategy. I look to those adults in my life, and I learn from them.

Dawson: Yes. I learn from direct interaction, and now, I'm learning from observing, as well.

Beth: Right. That direct interaction is still important, which brings up our second strategy, "I communicate." Infants are communicating from their first moments. They're crying. They're cooing. They're gesturing. After a year of experience, well, they're much better at this. In the second year, it really takes off, and they have this impulse to communicate, to do it in whatever ways they can. This is true for all children, including children with disabilities and suspected delays. Most children born deaf, they'll babble with their hands during the first year, and that will only accelerate in this second year. For children learning more than one language, they're going to be building vocabulary in both of those languages. We're talking about all kinds of communication here, both with familiar adults and with other children.

Dawson: We're going to talk a lot about spoken language, but I want to say a word for the other kinds, too. Children learn language from the very first – but they learn body language, too. We're so good with body language as adults that we sometimes forget that it's even going on, but we use it all the time, where we gaze, we point, we smile, we smirk. We make gestures, we slump our shoulders. This is all communication, and children learn this language in the same way that they learn spoken language.

Beth: This makes me – I'm going to bring us back to that emotional eavesdropping video quickly, because some of you may have noticed that the magazine lady used a really big word there. She said, "That's aggravating," not something simpler like, "That makes me mad." They did that on purpose, because they wanted to make sure children didn't know the words. That meant children had to read other cues, so her volume, her facial expressions, her tone of voice.

Dawson: Exactly. It is not just listening to the content of the words, they're communicating in so many other ways, as well. Children are really good at this. If I pout as a child, you know what I mean. I'm not happy, and I'm using my facial expression to communicate that to you.

Beth: They use their whole bodies to express that, too. Some might turn away, or the classic throw themselves on the floor. If you've worked with a toddler, you've seen that. X (25:10)

Dawson: Expressions, postures, gestures – and let's recognize emotions, too – are a kind of communication. A child might be hungry and not have any other ways to express that yet other than by crying, but that is communication in that context.

Beth: Definitely.

Dawson: There's no doubt, though, that words are useful. It's probably the most important communication tool that we have, and especially during the second year when we start to talk, and talk, and talk, and talk, and talk.

Beth: Yes.

Dawson: Think about language from the child's perspective for a moment. As my language is developing, it deepens the kinds of interactions that I can have with adults. Suddenly, I'm better able to let you know what I'm interested in, what I'm seeing, what I'm thinking, and I can ask you about what you're seeing and what you're thinking. In this way, the invisible things all around me are starting to become visible, and I can talk about them. It's easier to understand things like what other people like and what they dislike, why they're doing what they're doing,

which has been a mystery forever. What are people feeling and thinking? Suddenly, these are opening up for me.

Beth: Right. This really strikes me that all this communication is both coming from and going toward other people. This strategy is linked to that first one, looking to and learning from other adults.

Dawson: Absolutely. That's the whole point of communication – we want to understand one another. As children become better communicators, they're deepening their connections with their caregivers their families, their friends, and let's remember their culture as well.

Beth: Now I want to bring in this third strategy, which also helps children in their blossoming relationships. Number three, I experiment.

Dawson: I do experiment, yes. During my second year of life, I will experiment.

Beth: Yes. Banging that rattle again and again and again or saying the same word over and over and over.

Dawson: People can disparage this by saying they're getting into things, children are getting into things, but that's what good scientists do. You don't experiment just once. All those research studies that we were talking about, they involve dozens of studies and hundreds of children. Why? Because it's almost impossible to learn something from doing it just once. So yes, I'm going to say this word over and over. Yes, I pushed my toy off of my tray onto the floor, not just once but twice, because I wanted to know. The first time, it was given back to me. The second time, it happened again, and I have just learned something. But that happened when my caregiver was in the room. Now the caregiver's outside of the room, and I'm not sure it's going to happen again, so I'm going to have to push it off one more time, because I want to know, do different initial conditions lead to different outcomes?

Beth: Probably not how the child would phrase it, but yes. That repetition, absolutely key and part of experimentation during this stage.

Dawson: Yes.

Beth: As Dawson has been saying, children are these amazing little scientists doing tests of all kinds, and that includes with other people. Figuring out other people, it's difficult. It's difficult for us as grown-ups. All those invisible things that Dawson mentioned are about other people – their emotions, their ideas – and because they're invisible, you do a lot more testing to figure them out. Think of something as simple as sharing, right. The rules are complicated – when I share, what I share, how you share, who you share with. That may be different with different people. There is no rulebook, unfortunately. I'm sure everyone would love one. But because of that, children need to test, and they're also getting better at that communication. That testing sometimes comes out as –

Dawson: "No."

Beth: Yes.

Dawson: "No."

Beth: Yes, I agree with you. You got it, Dawson.

Dawson: Yes.

Beth: I think this is a great time to watch a little video about children who are still learning about sharing. I want you to focus on the two on the left. They both want to play with this wooden box, let's see how they work it out. While you're watching, think about what strategies these children are using, and use that Participant's Guide to jot down any notes. Here we go.

[Video begins]

Teacher: It balanced in there. Are you guys playing together and working it out? Well, he's putting it in the bigger part. Yeah. It's bigger. There's green and yellow in there. James, look, if you get up on your knees, you can see inside.

[Child screams]

Teacher: Hmm. I think that's his word saying, "I'm not finished." I think we need to wait. He's still playing with it.

[Video ends]

Dawson: That child in the white shirt is trying to figure out how to get a turn, and it's not easy. Like we've been talking about, there's more rules here, and how do I know when it's my turn? When I pull it toward me, he pulls it back, so am I supposed to wait? How will I figure this out? How long do I wait, and does he know that I'm waiting? I'm going to pull it, and I'm going to test again. And no, I'm not sure. I'm trying to figure all of this out.

Beth: He is, right? Can I say a word for that teacher? She's giving great support here. She's helping them communicate and to figure out how to share without stepping in too much.

Dawson: She is really good, and she stays calm the entire time. So helpful.

Beth: Right, and that can be so hard to do, especially when learning new social skills. It can be difficult, and it's easy to feel like things are going wrong with a child is upset. But this is entirely typical, and I can't say it better than the folks at Zero to Three, who write, "Caregivers recognize that toddlers constantly test limits and express opposition."

Dawson: We saw both of those. The child in the white shirt was testing, "When do I get to play?" The child in red expressed his opposition in that amazingly high-pitched screech.

Beth: Oh, yes. But the teacher, she stayed calm, and she recognized that those behaviors are typical. We don't want to avoid these exchanges, because being there to help navigate them really helps children learn from them, and when we do what she did – when we create that calm environment, we help them practice the social skills – we show children that they're safe and they're capable of learning. When children have that feeling of being capable, well, that's what's important to becoming capable.

Dawson: Absolutely. It all takes practice. Even skills as simple as taking turns, as we see here, it takes practice.

Beth: Notice that's how the teacher framed it for them, too.

Dawson: Yeah. We're taking turns here. He seems to be saying that he's not quite done, let's wait our turn. It's brilliant framing for both of the children, because it helps both of them understand how successful sharing can take place.

Beth: This brings us to our final strategy, I play. Do you want to introduce this one, Dawson?

Dawson: Yes. Play. We talked about play last time and in many other webinars and resources, because play is so important. Play is learning. It is not frivolous. It is not a break from learning, play is learning.

Beth: Right.

Dawson: From the child's perspective, it can help us understand this. The world is so big and so complicated, and I want to learn about all of it, so what can I do? What strategies do I have?

Beth: It's all those things that we've said. Watching those adults in your life and how they do things and learning from them. Communicating, so learning by listening, but more and more by talking, asking questions, testing boundaries, and experimenting. That child's rolling that ball again and again and again, because they want to learn about roundness, and that's what they're learning about as they do that. Experimenting often involves learning about new things, but sometimes, we experiment to get better at the things that we already know. And for that, might need practice.

Dawson: That's what play essentially is. It is safe, joyful practice. You know, I may have learned how to toddle already, and I'm working on walking, but I need to practice. Why? Because there's different surfaces and different angles. There's with and without shoes. I want to go at different speeds. I want to go alone and with other people. All these are different, and the fun of play draws me in so that I practice these skills willingly. You know, I run through the grass because I'm chasing after my grandpa. I put the puzzle piece in just so, because it feels good to do that. I pull the pants on my doll so that we can play together. I'm doing these things, I am practicing skills I'm developing. This is joyful learning. That's what play is.

Beth: Play involves this experimentation, too. There's a lot of overlap here, right? Just to bring it back to the adult perspective, one powerful thing about identifying children's strategies for learning is that it helps us see that learning. When we see the learning, we're in a better position to support it and help children along. As adults, we are often focused on getting things done, and we see children as these little people who, well, they're not very good at getting things done. Let's take eating for an example. Children can seem quite unskilled, and it's true, they're not as coordinated as we are, but eating is really only part of what they're doing.

Dawson: Let's watch a video to see this in action, we're going to see the same environment as we saw earlier. Keep your eye on the little guy in the white shirt on the right. Again, jot down in your Participant's Guide what skills you think are being practiced in this video.

[Video begins]

You guys are all growing. Here. Look, I'll show you. Put your fork down, then use both hands. Oh, you still have quesadilla. I'm sorry. I did not see that. Uh-oh. What happened? Where'd it go? Where'd it go? I don't know. Is it gone? I know, it's on the table. Did you want a lid so you can actually drink it? Oh, thank you for cleaning it with your quesadilla. Here. Are you ready to

try? Here. Both hands. Both hands. It's different than the bottle. Slowly, slowly, slowly, slowly. That happens. That's part of trying.

[Video ends]

Beth: How many of you noticed the little guy in the white shirt who was kind of off to the right side of your screen? He leans forward, and he tries to drink his milk, but with no hands. We've also captured a still of this in case you did miss it, because it was brilliant. This is just a beautiful example of experimenting during mealtime. That same child – so he spills, but he takes delight in it. He's splish-splashing around on the table. The teacher, she could have jumped in, but she recognized this is new and interesting material. He's learning and figuring out how it works. It's important. She also only put a little bit of milk in that cup, so the mess wasn't too great, and that's good planning on her part.

Dawson: Good planning, yes. Just a quick reminder, stepping in to help sometimes isn't always helpful. If, for instance, I'm this little girl having trouble putting my sandals on to go outside, let me try. Don't jump in too quickly. I have to learn this at some point, and I'm working on it now. I'm focused. I'm trying, so just let me do it. Don't step in too quickly. And if I get upset, yes, step in. That's fine then, but less is more. We sometimes say, be that guide on the side. I remember I would sometimes step in too much when my daughters were growing, and I remember them pushing my hands away and saying, "Self it, Daddy, self it." I had to listen.

Beth: I love it. "Self it, Daddy." Learning is a slow process, and allowing children that time to try things on their own is so beneficial to them. Your story reminds me of my own daughter, who has loved helping in the kitchen since she was a toddler. There were some times I just wanted to crank out a meal, or even if we were doing something fun like baking cookies together, I just wanted to be done, but I had to remind myself I needed to slow down and enjoy that process with her. Then watching her – one of her favorite things is to either take the whisk or the hand mixer and whisk with gusto. She'd go around and around, and she did her little tongue back and forth. She took such delight in it, and when I slowed down, I was able to see that magic in watching the world through her eyes.

Dawson: Yes. Seeing through their perspective. It helps us understand their learning, too. We need to schedule this extra time. Let children do things on their own. They are little scientists, they need time to do their experiments. Have them help you with a task that you're doing, you know. The more that we can do things like that and slow down and have them help us, the more we help with their development. This is, again, something that home visitors can share with the families that they work with. When kids are taking a long, long, long, long time to get something done, remember that that is productive time, because during that time, there's a lot of learning going on.

Beth: Right. This is so important, we are going to add it as a fourth principle. Again, here's those three principles from the first year that are true in the second year, and now we are adding this: I benefit from doing things for myself when I can. Remember, this is going to look different for different children, children with differing abilities, different temperaments, cultures, developmental levels. We also need to adjust for children as they grow and change, but this

principle, it's consistent. Give children that time and the space to learn things for themselves. Research shows that children who feel that sense of agency learn better.

Dawson: That doesn't mean that the adult doesn't help when needed, of course, or demonstrate a new skill or task. A responsible caregiver who is there to encourage and guide the child is absolutely essential.

Beth: Providing that support when needed is important, but it is that "when needed" that is so key here, because we know that stepping in too early can interrupt children's learning. Research also shows that providing this support helps build children's executive functioning skills, which is great for school readiness. We need those.

Dawson: Absolutely. I think we are ready to transition over to what we as caregivers can do. Here are some effective practices that we want to share.

Beth: Let's do it, but before we do, a quick note about flexibility. I know this isn't new to anyone who works with children, but I want to put the reminder anyways. Flexibility, it's the name of the game. Children are unpredictable.

Dawson: Delightfully unpredictable.

Beth: I'm mentioning it here, because we're about to talk about different practices. And you know what? Sometimes they're going to work, and sometimes they won't. For example, one child might not like the feeling of sand on their hands, or one minute a child's happily dumping sand into the table, and then the next minute, oh, right on their friend's head. Children are different, situations are different, and we as the adults, we need to be flexible.

Dawson: It's good to be prepared with more than one option, too. That's a type of flexibility.

Beth: Yes, that can definitely help. Let's look at this first strategy that children use to learn. We said, "I look at the adults in my life, and I learn from them," which we're going to shorten to "I watch" here. I want us to think back to that emotional eavesdropping video again. Children are learning from us even when we're not directly interacting with them. Dawson, knowing this, what's a good effective practice here?

Dawson: We like to think that we are always on our best behavior, but maybe we're not. It can feel a little like, that's okay, because maybe infants and toddlers will overlook this. They won't notice if I have a little bit of a short temper or I'm rude now and again, but no.

Beth: Right. Children are watching how we behave, too, just like we're watching them. We, as the adults, are an example to them, and they will emulate what we do. Our first effective practice is, set a good example.

Dawson: I am learning about how to interact in the world, and I don't have a lot of experience with this yet, so I'm watching what you are doing. It's just something to be aware of.

Beth: This is not just avoiding those bad behaviors, it's also modeling good behavior. This is an opportunity to help children learn what they should do in any given situation. There's this classic study from a few years ago where they found that 15-month-olds will work through frustration and persist on a difficult task when they first see an adult having difficulty with that

task, then putting in the effort to figure it out. That is super powerful, right? Modeling persistence can build up persistence in the children that you work with.

Dawson: From the child's perspective, again, I'm looking at these adults, and everything seems so easy for them. And here I am, struggling to put on my sandal or my boot. It's so hard.

Beth: Exactly. This kind of modeling, so sticking with difficult tasks and trying things over and over, is just so beneficial to young children.

Dawson: Yes, and the same thing with behaviors and emotions. I see you being patient and waiting, and now it's easier for me to be patient and to wait. And I see you getting frustrated, but then I see you take a deep breath and calm yourself down, and what am I learning? I'm learning that, when I feel that come up in me, I can do that same thing. I'm still learning to control my emotions, so I can use all the help I can get. Being a good model is really helpful.

Beth: A reminder here that emotions can be invisible and hard to see sometimes, so using that second practice here, talking to children, is super important, but especially talking about our emotions and their emotions and feelings. When you say, "Oh, I'm feeling frustrated right now," it helps the child know what that feeling is, then identify their own emotions, too. Think about it. Feelings of frustration and anger can seem pretty similar sometimes. Children need help distinguishing those two, even in themselves, and hearing you talk about it can help. It also shows children, "Hey, we all get frustrated, and that's okay."

Dawson: We can learn how to deal with it, too. We grouped it into our second strategy that children use, which is good. They do work together, all the strategies do. I like to observe adults, but I also like to communicate with them. When you are talking to me, if you would, please talk to me at my level. On my level, that means with gestures, with expressions, but especially – and perhaps most importantly – with the words that you use.

Beth: So true. I think it's, again, helpful to see this in action, so we have a great video example here. This is the same mother and daughter you watched earlier in that finding the ELOF, only this time, they're looking through a book on their home visit. Again, it's in Spanish, but even if you don't understand, you're still going to be able to see how the mom is really talking to the child at her level.

Dawson: Yes. Here we go.

[Video begins]

[Women speaking Spanish]

Hazel: Meow, meow.

Woman 2: What does the dog say? What does the dog say? Woof, woof. What does the dog say?

Woman 1: Did she like the rabbit?

Woman 2: Yes.

Woman 1: She likes the softness of the hair.

Woman 2: It's soft. This one is soft. Look, he looks like Tovi. Touch it. Touch it, Hazel. Touch it. Look, hair.

Hazel: Look, Mommy, look.

Woman 1: Look, what is she showing you, Mom?

Woman 2: Yes. Wow! This is a tiger.

Woman 1: She is interested in turning the pages.

Woman 2: Yes, and she touches them.

Hazel: It's here.

Woman 2: Aha, it's there. Do you want to see another one? Do you want to see another animal? It's an animal.

Woman 1: You like the kitten, meow.

Hazel: Moo.

Woman 2: Moo, this is a cow.

CHazel: Look, meow.

Woman 1: Look.

Woman 2: Look.

Woman 1: Oh, she says meow.

[Video ends]

Dawson: So many good practices in there. The mom is talking at the child's level, no baby talk, using real words and real sentences that her daughter can understand. Remember that this will change a lot during this second year. As a child, my vocabulary is growing a lot, so talking to me is going to help me. It's going to help me build that vocabulary and come to understand more and more. Feel free to repeat things, please. Talk slowly. But again, people are the most important part of my environment, and I'm excited to understand more and more as I'm going along. I'm better understanding the social and emotional interactions that I'm having, and this communication really helps with all of that.

Beth: It does. I also want to note how the mom paused for the child to respond during that interaction, too.

Dawson: Thank you for bringing that up. Make space for talk.

Beth: Talking with children, not at them. There was a beautiful back-and-forth conversation that involved both verbal and nonverbal communication. This is a time of rapid development in children's speech production, but it's going to look different for different children. Some might be making sounds rather than words, and that's okay. They're still communicating. Make that space in the conversation for them. When they're starting to say a few words and then string them together, first, help them sound things out. Repeat things, just go with it and resist that impulse to correct them, because what we want to do here is encourage communication, not

precision. In that video, the child used both English and Spanish, and that is totally OK, it's part of their learning. If a child asks for more leche, you could say, "Yes, you would like more milk. Mas leche. Thanks for asking. Gracias."

Dawson: It's worth remembering that we are also talking about building social and emotional skills here. I learn from watching the adults and communicating with the adults, and I'm having big emotions this year. Please talk to me about emotions as well. You can include pictures and visual supports whenever you can. That's helpful. I want help identifying and understanding these emotions that I'm having, and managing them, as well.

Beth: Children, they're watching, they're communicating, and they're experimenting. So number three, I experiment.

Dawson: We should encourage these experiments, giving as much time, as we've been saying, as possible, so children can have autonomy. We can do this in a couple of, I think, crucial ways. Prepare spaces and materials for me as a child, speaking as a child again. It's really helpful if you can get ahead of that and help me by preparing that way.

Beth: I have one last video here I'd love to share, and it's of the same teacher we've seen throughout the webinar today. She's talking about how she prepared her learning environment using loose parts.

Dawson: She has a bunch of great ideas here, so let's watch.

[Video begins]

Teacher: We decided to go with more of a loose parts philosophy, as far as toys are concerned. Each classroom is geared to what the children are engaged in. I watched the children for a while, and then I decided to incorporate what their interests were into the rest of the classroom.

[To child] Did you see this?

I put out a Keurig carousel that would normally hold the Keurig cups as more of an inserting tool. Last week, we were all about inserting, so now it's in and out. Now that they have the ability to remove the object, it's not just inserting. We've moved to that next step. I did the Keurig carousel in a variety of different-sized curlers.

[To child] What are you going to do with the curlers?

I want them to problem solve. I want them to figure out, "This doesn't fit. Well, what can fit?"

[Video ends]

Dawson: I love it. "I want them to problem solve." Yes, we do. I love loose parts and all of the open-ended materials that she's using there. Here, we have some additional images of how they used these materials in creative ways and how they can stretch to operate in many different ways.

Beth: So creative. I want to play on that space. I love how she had different objects that can be used in all those different areas. So fun.

Dawson: And they're based on the children's interests. She stepped back and watched for a while first and then built around that, these concepts of in and out, for example. Brilliant.

Beth: I love that. Did you catch that texture wall at the beginning?

Dawson: Yeah. I hadn't seen that before, but yeah. So cool.

Beth: I love that. She didn't talk about it, but she also showed outdoor materials, which, heading outside or bringing the outdoors in, whether that's sticks or shells or water or stones, whatever it is, is a great way to incorporate open-ended materials. Just make sure it's a safe size for the children that you're working with.

Dawson: Absolutely. We always want to have safe spaces and materials for children. If you keep in mind from the very beginning as you're gathering these things and creating these spaces, if you're keeping experimentation in mind from the very beginning, then you're going to make decisions that will promote child development, because you're going to have a space that says "Yes" to children. It says, yes, you can play here. You can explore with these materials. You can experiment here. You can be your little scientist self. I love her creativity. It's such a good example of how you can build in that exploratory mindset from the very beginning. One way to do that is to ask yourself, what will my little scientists be interested in today?

Beth: Right. Not just what will be most efficient or what would be easiest to manage. Those are considerations, too, but most important, what will the children enjoy experimenting with today? We have to consider their developmental levels, physical abilities, and cognitive delays, and encourage you to adjust for children so they can take part, too.

Dawson: I would also point out that it doesn't have to be fancy. You know, the Keurig container holder.

Beth: Yeah.

Dawson: Brilliant. Less is often more. Think about rotating materials, having a mix of familiar and unfamiliar so children can have that sense of, "I know how to do this, and I can do this, and I can enjoy that sense of, you know, accomplishment and being expert at something, and then I can find something new, too." It's a wonderful way of keeping things lively for children. What a child likes to interact with changes through time, too, and with changes with children's temperaments and things, so be aware of that as well.

Beth: I wonder what her learning space looks like today with a whole new group of – whole new group of children and new interests and temperaments. I'd be curious.

Dawson: I would guess it changes a lot. I also want to recommend here – time. Do not rush things. As adults, we have a tendency to try and get a lot done, but here, I want to say it's OK to relax. As a child, I'm trying to learn. I'm not trying to mark things off on a sheet. I'm not trying to get something done in that way, I'm trying to learn. If you move me from one task to another too quickly, I won't have the time that I need to experiment in the way that is going to help me most in terms of my development.

Beth: Based on that, let's adjust number four – Prepare space and materials for me, and don't rush me.

Dawson: Don't step in too quickly. Don't rush me. I want to do things on my own as much as I can.

Beth: A little planning ahead, like the teacher putting that little bit of milk in the cup so there wasn't too much mess, that can make it easier and allow us to give children that time that they need to explore and learn and play.

Dawson: Strategies like that are things that we can share with families, too. Home visitors, you can share this with the people that you work with.

Beth: These strategies that give children space and time for exploration. Children like to go slowly sometimes, but we can plan for that.

Dawson: Children love to play, and play is learning. Let's emphasize this again. In that second year, play is becoming a lot more sophisticated. I still love playing with objects, but they're getting a little more complex now I may need your help to work with these new objects. I'm starting to play on my own a little bit more, sometimes next to other children, trying to figure out how to work with other children, and that's a work in progress right now. Understanding other kids and figuring out the emotions and things that are going on, I'm going to need help understanding those things. I love hiding games, I love singing games, but again, even with those, I'm going to need some help learning those things.

Beth: Right. In short, children are enthusiastic about play, but they will need our help. Be there for them, but follow their lead and be sure to give them that space they need to play in their own way.

Dawson: Absolutely.

Beth: It's just an extension of the experimentation and exploration that children do, and the adult's role is the same. I think we can step right back through the things that we've said, because they all work here. First, don't rush me, and then you want to set up the play for young children. Make sure that space is safe, the materials and activities are at the right developmental level and free from distractions, and be there to help children be as independent as they can be.

Dawson: Yes.

Beth: Then there's talking to children at that appropriate level. For children who are dual-language learners, if you're able, facilitate their play in the home language or incorporate that where you can.

Dawson: Encourage them to use their home language, but also bring that language into the space as much as you can with signs and with language.

Beth: You can do that through books and through music, too.

Dawson: Absolutely.

Beth: Finally, you'll be able to provide that good example, and home visitors can support families in these efforts at home, too.

Dawson: We've done them forwards, and now we've done them backwards. I think that's a good summary, and it is just in time.

Beth: Join us next time, please, for a final one in this series, but a few quick announcements before we go.

Dawson: There are so many useful resources at what we call "ECLKC," the ECLKC, so if you have any questions or want to dig more deeply into any of the topics that we've covered here, please go there. They have so much wonderful information there.

Beth: Just a reminder to save the date for the third and final part of this series on how infants and toddlers think and feel. We'll be covering that third year of life from 25 to 36 months at this same time on August 18th, and we hope to see you then.

Dawson: Thank you again for all of your time and attention and thank you especially for all you do on behalf of children.

Beth: Yes. Thank you for being here today. Have a good afternoon, and we hope to see you next time.