

Sensory Processing Workshop Video Transcript

MELLANIE: Welcome everyone to first in series of seven presentations we're calling seven senses and we are the Hawaii Pacific Deaf-Blind Consortium.

For those of you who have friends that weren't able to join us today, this will be recorded and we will be sharing this link with you afterwards.

Really like to introduce staff and then we'll get the presentation going. I am Mellanie Lee. Director and Educational Specialist for the Hawaii and Pacific Deaf-Blind Consortium. Jen?

JENNIFER: I'm Jennifer Tarnay, Project Coordinator for the Hawaii and Pacific Deaf-Blind Consortium. Roz is on with us today.

ROZ: Roz Kia, Resource Specialist for the Hawaii and Pacific Deaf-Blind Project, and Project coordinator for the Comprehensive Service Center. We have Ginger.

GINGER: I'm Ginger Knowles, Project Support Specialist.

MELLANIE: Thank you. Before we begin with Jennifer, I would like to just let everybody know that it's importance to know there are seven senses around children we're serving. We'll send you. Please subscribe to that. I think Jen or Roz or Ginger, do you have anything to add?

You'll hear me talk a whole bunch today. I would like to thank our wonderful interpreters and captioner that are with us today and we'll be with us throughout the whole seven series we're presenting. So without if you have any questions today, please feel free to write them in the chat or just raise your hand or just shout out and we would like to address them.

So without further ado, Jen, I am going to hand it over to you and thank you everybody for being with us today.

JENNIFER: Great. So like Mellanie said, my name is Jennifer Tarnay. Project coordinator for the WIOA and Pacific Deaf-Blind Project. Middle-aged Native Hawaiian/Caucasian with long black hair, black shirt, green sweater, koa wood earrings, joining you today from the home office. Behind me, a white wall with a couple of pictures that are hanging on the wall. I would like the disclaimer that in joining you from my home office. You may hear my dog. I have a very large loud catahoula leopard dog. Gets a little protective. If you hear him screaming in the background, I do apologize.

If I go quiet for a minute, that's why. We'll wait until he's done and move right on. Today we're going to kick off our seven senses series by talking about the senses about sensory processing.

Before introduction to all of our senses and sensory processing and sensory processing disorder achieved after leaving me this presentation is understanding of the sensory system, where they are,

what they are, where they're located and understanding of what happens whether that processing doesn't work typically or the way that it should. And also, to understand what we can do as educators, as family members, as support systems for those children and young adults who have sensory processing difficulties.

How many senses do we have? Seven. In truth, there are eight.

Eight senses we're going to talk about today. As children, we often learn about five senses.

There's a lot of story books out there much and videos and songs that talk about our five senses and those are the external senses. Those are the ones that we all know. Sight, taste, touch and smell. Additional three senses that aren't as well known or talked about socially are internal senses and those are vestibular, sense,

which is responsible for balance and movement.

There's our proprioception, which is our muscles and our joints.

And then eighth one -- Air Pods just died. Eighth one is interoception.

I can't see anybody. Can somebody give me a notice that you can still hear me okay?

ROZ: It should be live captions coming through. Not auto.

MELLANIE: So let's see. I didn't see any captions then. So let's see. That was me. Okay. That's me.

JENNIFER: Thank you, thank you. So Interoception is where I was at. That is what goes on inside of our bodies. Inside of us. All experiences, all knowledge, all understanding, of our world are gained from the information that we gather through those senses.

We know that walls are solid because we can see them, because we can touch them and feel them, because we can bump into them and know that that is a hard solid surface.

We recognize taste, what is sweet and what is bitter, what is salty, because we put those in our mouth and our tongue talks to our brain. We know if we are in danger. Really loud unfamiliar sound.

We know when we're in danger. We're able to do things like safely cross the road or get in out of a car because we can see

if there's traffic nearby. We can see how to grab where the door handle is or grab the door get in on sounds nearby or traffic zooming by.

Our brains are continually taking in sensory information and making sense of what it is.

That's going on all around us. When our sensory processing is working the way it should, the whole process is super complex and it's what allows us to function typically or deemed as

typical in the world around us. Now we're going to take a look at the individual senses, real brief peek.

First, since we're going to talk about it quick is vision.

Our eyes show us to interpret what we see. That message happens, we see it, goes to our brain, interpret what we're seeing. We are able to distinguish colors, shades of colors, shapes, letters, words. It helps us to guide our own movements or the movements of things if we're moving things through space.

Our vision helps balance and allow us to continually monitor our actions and the actions of the objects around us. Vision is important for both verbal and nonverbal communication.

Our second sense is hearing, auditory sense. It allows us to listen for different sounds if people are talking so we can understand speech. Helps us to determine the direction that sounds are coming from and know which way to turn our bodies or turn to find those sounds. Air pods just died.

Rough tech day over here.

People still hear me?

ROZ: Yes, you're fine.

JENNIFER: Okay. Auditory sense, if it's processing appropriately or typically, it helps us to filter out some sounds and helps us to focus on which sounds are important.

Third sense is touch. Allows us to feel the whole world around us.

Provides us information about the shape, about the size and the texture of objects. It helps us to understand our surroundings and give us boundaries in space. It works alongside our other senses for the development of self-awareness. Touch also plays a part in helping us feel safe and helping us bond with other people, create

connections with other people. Nerve endings we have in our skin, and skin is the largest organ in our body. Nerve endings in our skin allows us to interpret all kinds of touch. So from a bear hug to having something brush lightly past you, very, very important.

Fourth and fifth sense together because they work very, very closely together, so our sense of taste, or our gustatory sense and sense of smell, olfactory system, gustatory. How food tastes, salty or sweet.

Also lets us know is this food or is this not?

That comes from our taste and touch and our mouth. Sense of smell is system that provides with information about those different tastes. Everyone has been sick at some point, had a cold, not been

able to taste their food. Smells aren't just about food. All the things around us. Nose gathers information and that information goes to our brain and the smell can affect our thoughts. It can affect our emotions. It can affect our behavior.

Our sense of smell also can alert us to things that are dangerous, like gasoline or bleach.

Let's us know if we're okay. Smell of smoke, we know we're in danger.

Sixth sense is proprioception. Proprioception is our body awareness and positioning.

It's what enables us to touch our nose. Know that my arm is moving and I can move it here and it's going to accurately go the place that I want it to go, to my nose. Our ability to drive a car, for those of us that can drive, that is based on proprioception. We can watch the road with our eyes and know exactly what our arms and legs are doing. That happens at an unconscious level. When you go to touch your nose or you see the road turn and your arms turn, been doing it long enough,

unconscious thing. We don't have to think about, okay, I'm going to touch my nose, reach my arm out in front of me first, and then I need to bend at the elbow to get to my nose. It just happens on an unconscious level.

Our seventh sense is the vestibular system. That is balance and movement. Vestibular system informs all of our basic survival skills.

That is what lets us know am I upside down?

Right side up? How fast is my body moving in space? How high am I up from the ground? What direction am I going? Right direction or the wrong direction? This not only balance but coordination.

Finally, eighth sense, that is often left out, interoception. How we interpret signals from inside of our body. Examples is feeling hungry or thirsty or girl in the picture needing to use the bathroom. Not feeling well. I don't feel well. I'm sick. I have a headache. All of that happens inside of our bodies. Those are eighth senses. We said we have senses in our series. Sounds better.

Now we know what our senses are, what they do.

Brain able to process them typically. Let's kind of talk about what happens when our brains process them differently. That can be called, might have heard it, sensory processing disorder or sensory disorder. Make sense of the world and everything going on in the world around us. When our sensory processing isn't working, that process is disrupted, it can create what is viewed as inappropriate or atypical response. Those responses can do what we call hyposensitive.

Too sensitive, understimulated and undersensitive. When we have kiddos out there seeking input, wanting to spin in circles or wanting to squeeze, squeeze things or seeking sensory input, that can happen when the sensory process isn't processing typically or it can be hypersensitive, so overstimulated. Too much is going on. Too much light. Too much noise. Too many smells, and that, we end up seeing kiddoes that are sensory avoiders.

Right? They don't want to eat whatever that texture is or whatever that smell is. Curry, too strong. Cover their eyes when the lights are bright or cover their ears when there's a sound.

Those are our sensory avoiders. Because I dislike being a talking head, I have a video to share from a child's perspective about what sensory processing disorders are.

I'm sorry, I don't know if this is captioned but I do know that's not signed.

I'm going to be able to hear it on my end. Pretty sure I'm going to stop sharing my screen for just a minute to make sure.

I didn't have this sound on either. Play the video with no sound. (captioned video)

JENNIFER: I love that video. I think it's a beautiful little summary of everything we just covered and gives us a glimpse into what we're going to jump into next, which is we know what typically sensory processing is. We now kind of know what it is when it's atypical. What do we do about it? Working with occupational therapists is ideal, not just occupational therapists. Teachers, special education teachers, parents, specialists, speech language therapists know about these activities we're going to talk about. Important to know in this video, talked about, I don't know if he said how many times a week. Typically,

OT is one or two times a week, sometimes three, but it's important to know that one or two or three times a week isn't enough for our kids and individuals with sensory processing struggles.

It needs activities to need to be incorporated throughout the day and throughout activities.

First thing we're going to look at, I don't like slides that are a bunch of words, but for the purpose of what we're talking about, I thought this was very important. Take this off.

Have all the words on a page. I'm hoping that you will come back. I need somebody tell me what your screen looks like because my screen just went completely jumbled.

Are you guys seeing things, white screen, black text? Or are you seeing what looks like somebody got in a fight with knitting yarn.

ROZ: It did look like the knitting yarn for a second. Back to a white screen with text.

JENNIFER: Okay. Thank you! Touch. When individuals struggle with touch, processing touch, tactile sense, wide variety of textures might be overwhelming. It might be light touch might not feel good.

We have hypersensitive and hyposensitive on the side here. Other example. Decrease awareness of being touched or bumping into things. These are kids that you see real rough and tumble kind of play, running, slamming into each other. Slamming into walls and chairs and tables.

You also might see kids that pull away from any little bitty touch. Don't want to be cuddled.

Don't want to be touched. Any kind of touch stresses them out and they avoid touch. Avoid changing their clothes. Avoid toileting because they feel their clothes on and off their skin.

On and off their body might feel yucky. Often will avoid messy play. See them very clean, tidy. Don't like walking on sand or water. Left

side, all of our lookalikes. On the right side, strategies that we can use when we're helping those individuals. For those that have that undersensitivity hyposensitivity, we can do things like massage, weighted blankets, weighted vests.

Easy one is a weighted backpack. Taking a backpack and putting some books inside.

Wear the backpack around. Gives them just enough weight to help them feel better. Snuggling with a blanket or bean bag. Some stroke the fur. But messy play, structured, structured but messy play, teaching them how to feel better about messy play, for hypersensitive individuals, touch, hypersensitive to touch, gloves can be used to help with that. Warning people, warning children, warning individuals ahead of time that this activity is going to be a little messy,

you might not like it, but it helps them to be prepared for what is coming. Also, letting them know how long that activity is going to last so they can know that's going to be over in five minutes or two minutes. Setting a clock helps them with that. Visual timer. Always introducing things slowly and allowing those individuals to set the pace for what you're doing with touch. We have taste. Taste can get really complex because especially with children, we have picky eaters.

Some kids truly are just kind of picky. Don't necessarily like all the foods. Pick and choose. Then you have kids where that's a true sensory struggle for them, hyposensitive or hypersensitive to the way things taste. And what that looks like, hyposensitivity, it looks like constantly putting things, whether they're food objects or not, in their mouth, chewing on pens, chewing on their hair, clothing. I've seen a lot of clothing chewers. Mealtime, shoving all the food in their mouth.

Chews, likes extreme flavors. We tend to think children shouldn't like incredibly spicy, salty foods. Those hyposensitive-to-taste children will be craving that and looking for it.

Might also lick things, food objects or not. I have had kiddos lick tables and walls.

Then sometimes we see that excessive drooling or salivating.

We see that little kids with typical development, but we might see it beyond that point of typical.

For the hypersensitive to taste, gagging. A lot of gagging when you wouldn't expect it. I've had kiddos that I worked with that gag at the thought of a food.

I've had kids that gag at the sight of a food across the room. That is just too much for them.

I've had some that are afraid of those foods. Real physical response. Afraid, they cry. Some just have difficulty with the textures. Spit them out. Avoid them. Can extend to brushing of teeth as well. Activities, mouth fidgets or what's call chewelry, make jewelry necklaces, ring, bracelets for chewing. Oral motor games. Blowing bubbles and whistles and even chewing gum. If it's allowable and kids can safely chew gum without swallowing, can be helpful. Before, not necessarily during activity, but before an activity, getting to do those things. Encouraging crunchy foods.

Celery. Ice cubes are another good one. Careful. Children chip teeth with ice cubes.

Have the chewelry, can be something that, rubber band or scrunchie that is okay and safe for them to mouth on. If they're chewing something that is inappropriate, redirecting them to what they have that there's a safe allowable object for chewing. Hypersensitivity, oral stimulation, try to desensitize them. Let them know what's coming and have structured time for exploring things with our mouth. Food play activities to get them exposed with food getting more comfortable with them.

Things we know that are common. Maybe they like music or they like a particular smell, lotion. Having those present at meal time to help calm them down, to feel safe. Then massages before and during meal times can help as well. As always, want to avoid doing too much all at once.

Maybe with food, we can separate, give them one food at a time, those types of things.

Checking my time. Sensitive to smell. Sometimes hypersensitive. Seek certain smells.

They're out looking for them, searching for them. They want mama's perfume, mom's lotion.

They want to smell the cherry Jolly Rancher. Sometimes they fail to identify unsafe smells.

I will admit, I love the smell of clean kitchen, so Pine-sol, love it.

Lemon Lysol, love it. I love it. Is it safe to go smelling those things? No, not so much.

Sometimes we have kids that love those smells so much. Can't actually identify unsafe.

Hypersensitivity to smell, gagging or be sick and throw up when they encounter certain smells.

Distracted by smells. Sometimes it's too much and can't focus on whatever activity they're doing. We see kids struggling through meal times when they're hypersensitive to smells.

Food that might not have a very strong sense to people with a typical sense of smell, it's overwhelming, too much. They can smell it's offputting.

What do we do? Provide safe and appropriate methods for stimulating to make sure our kids are safe no matter what. Lotions, scented candles, perfumes. We have to be careful with this because we also need to be aware of the other people around us as well. Classroom setting, working with a child and you want to use lotion or essential oils, make sure we check in with the teachers, other students' families to make sure we're not causing problems for other people by solving our own struggles. Activities that make scents. Scented Playdough, spices, cooking spices.

Way to incorporate scent, cooking spices. When I was a kid, had a whole sticker book full of them.

Loved them. Easy one. Limit exposure to smell as much as possible. I have worked with kids who used nose plugs because that's what they

needed. In the time of masks and time of Covid, wearing masks, one thing that we've been doing with kids is taking those masks and putting, very lightly spraying it with essential oil inside that they like, scent they like to block out the other stuff and focus on the smell that is good for them. Block out the other stuff. If you know that you have a kid that gags around certain smells avoid wearing strong perfumes or lotions, introduce smell in fun ways. Stickers, Playdough, cooking, those kind of things. Our sense of sight, vision, hyposensitivity to that. We've all seen kiddos that stare at spinning objects, windmills or spinning lights, Undersensitive kids, understimulated kids will focus on that.

Also spin their own bodies. That can be because of the way they feel physical space, but sometimes it's to gain the visual feedback.

When you're spinning and you're just looking dead ahead, everything around you is spinning. Instead of spinning objects, make the world around you spin. Hypersensitive kiddos will look away. Can't look at your face.

There's too much going on in your face with your eyes and nose and mouth and things moving and makeup and lipstick or mustache. It's too

much. I have to look away from you in order to be able to focus on what you're saying and hearing you. We see kids that lose their place when reading and writing. Perhaps because there are too many letters on a page. It's overwhelming for them, for their eyes. Struggle

with eye contact. Might tilt their head a certain way when looking at things or concentrating. And we see those kids bump into things often.

They misjudge their spatial awareness, distance between themselves and other things.

So what do we do with these guys? For hyposensitivity, increase the visual stimulation, which use a lot of hand gestures. Do this

anyhow. Comes naturally. Puppets are extra appealing. Using lots of color and movement to gain their attention and catch them, capture that visual feel. Hypersensitivity, maybe we do exact opposite. Minimize all of visual stimulation or in some cases, might need to create a safe space. When they're feeling over stimulated, maybe there's a place in the room they can go to that is in the corner where there's not a lot visually going on. Can go and kind of calm themselves before they come back.

Encouraging rest and relaxation. Hard one allowing kids the time to close their eyes for a little bit. One of the easiest ways to get rid of visual stimulation, close your eyes, can't see it any more. Easy to calm down. Reducing clutter in a space. Using natural lighting.

Clear boxes for activities to easily locate what is inside of a box. Almost done. Proprioception.

Proprioception, what that looks like. See somebody having some difficulties with their proprioception, pulling, twisting, chewing, biting objects. We see that with taste as well. Kind of got to figure out which one we're working with. Sometimes it's both. Takes a little bit of observation on part of the parents teacher and team to determine why are they pulling and twisting and chewing and biting. Is it because they need the proprioceptive input or taste input?

See that across senses. Breaking toys, heavy handed, not realizing how strong they are. That rough and tumble kind of wrestling play. Maybe touching everything around them when they walk.

Walk down the hall or walk through the house. This is also where we see self-injurious behaviors seeking sensory input. Had kids that

hit themselves and that is typically always proprioception. Need that input. How do we give it to them? Give them access to things that is going to get their body moving. Swings, scooter boards. Saw that in the video. Exercise balls, fidget toys. Even providing like regular sips cold water can help with proprioception.

Chewing on jewelry. Weighted equipment, vests, backpacks works with proprioception.

Vestibular system with all the movements. Hyposensitive kids, we see they're the ones that are jumping from those high places, climbing really high, making us worry, freaking us out.

They have no sense of danger. Jump from the highest point they can possibly find.

They spin and spin and spin, never get dizzy. Swing as high as they can and don't ever worry about falling down, right? Every opportunity, they're upside down or running and fidgeting.

Hypersensitive vestibular kids real cautious. Hesitant to take any kind of risks, avoid movements, keep kind of to themselves and quiet in a smaller space. Might be fearful of heights. Something not that high off the ground. Couple inches might be too much.

See them preferring to lie down instead of sitting up right. Maybe they're leaning head or arm, balance activities on a line. Hypersensitive kids, regular movement breaks. Sensory diet consisting of physical movement opportunities throughout the

day. Alternative seating options. Wiggle boards, what she's standing on, that balance board. Sitting on a therapy ball. Sometimes even just sitting on a cushion or rolled up sweatshirt to give them just a little bit of movement.

Hypersensitive, exactly opposite. Limit any unnecessary movements. Make sure the chairs are solid on the ground. Make sure feet are flat on the floor when we're seated in class.

Any kind of movement we're going to introduce, do it slowly and allow it to be self-directed by the child. Finally, what difficulties with interoception looks like, we can see overeating.

We can see like not feeling full at all. Eating and eating and eating, not feeling hungry. Don't ever feel hungry. Don't feel a need to eat.

Not being aware that they don't feel well.

Children that might have a fever, just have no awareness that their body is fighting something and doesn't feel well. Not having awareness of body temperatures. Bundled, sweating body, have a physical response. I don't feel. Not bothered by it. Not being aware of needing to use the toilet.

Maybe those are the kiddos who pass the point of being potty-trained or pass the point of when we think they should be able to potty-train still having accidents. They don't realize that they need to use the bathroom. What we do for kids, set timers with toileting times, timers for meal times to help with routine and build in predictability.

Teach them body awareness, teach about emotions, to help them understand what different emotions and body functions feel like in their own body.

And finally, to wrap up, we're going to talk briefly about all of these things we're talking about. Sensory integration activities.

We're going to integrate activities that help feed the sensory systems throughout the child's day.

They can be used to help those who struggle. They can be used to help those who don't struggle. Even our kids that don't have sensory difficulties can benefit from this. What we're

finding, they are effective in supporting individuals to improve their levels of attention and focus to prepare them for learning, for participation in

activities, can help them tackle all the balances and support them with the energy they need to be able to respond appropriately and positively in the different demanding environments that children have requiring attention and focus, learning activities to provide vestibular stimulation. Prepare the brain for all learning that is going to be coming. Example, skipping, jumping, jumping jacks, running in place, high knees, those are alerting activities. Get your body moving and ready to go.

Organizing activities, those are going to prepare the body and brain as well.

Provides children the opportunity to increase their focus prior to entering into whatever activity we're going to have them

focus on. Math, English. Examples would be climbing, balancing, throwing into a target, using multiple senses to achieve those things. Scooting on those scooter boards. Then the final group are

calming activities. This is where we want to calm a child. Go through alerting and then organizing and then calming activities. This is important to ensure that we're calm and we're centered right

before we step into that learning activity. So maybe push-ups, maybe squishing a ball, deep pressure. That helps calm us down right before.

These sensory integration activities, if we do this in this order, learning activity, organizing activity, and calming activity,

going to help best prepare our children to be successful. As we get into the other senses in the rest of our series through the rest of the year, we can break this down individually into activities for each sense.

That is what I have for you today. Here are my resources in case anyone is interested.

Before I run out of time, does anybody have any questions?

If you do have questions and don't want to ask them here, that is absolutely okay. You can put them in the chat box. Fairly certain that everyone on here should have an email address that they got this information for presentation through. Feel free to email us and we can answer your questions, set up a telephone call or just communicate back and forth through email if you have any questions or concerns and we will be making these slides available. So all those things I went through quickly on what hypersensitivity and hyposensitivity looks like, what you can do, you'll have access to that in the slides when we send this out.

That, my friends, is all I have for you today so thank you very much for joining us the last hour of your day before you can be done with work. I know we have somebody, couple people that aren't from Hawaii. Thank you, thank you from the far reaches of the Pacific and far reaches of United States for joining us tonight. Hope you guys are all safe and well and we'll see you next month for our next sensory workshop.

I don't know the date. Somebody who knows better than me will let you know.

Yes, Becky?

Thank you everybody. I'll hang out here if you want to stick around. Stop sharing my screen.

Mel and Roz and Ginger, if you have anything you want to contribute, good-byes or anything else.

If not, thank you all. Have a lovely evening.