

SENSATIONAL WAYS TO PLAY

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This chapter provides therapists and parents with ideas for sensory rich activities that can be used in direct treatment and in home, clinic, community, and school environments. Activities should be used under the direction of a therapist trained in the sensory integrative approach; and need to be varied, monitored, and modified frequently. The chapter is organized to first present activities to enrich the child's daily environments and includes activities that provide specific types of sensations (i.e., proprioception, deep pressure, etc.). Next, imaginary play activities and play themes are presented to help the therapist and parents create playful, engaging, sensory-rich play experiences for the child. Activities for the specialized equipment often used with the sensory integrative approach are described. These activities provide the therapist and parents with a wide variety of variable and fun play choices. Child-directed strategies to improve self-regulating are presented. This section includes activities to regulate arousal level, decrease sensitive, and increase sensory perception. We hope the reader will find it inspiring and engaging.

Section 1: Sensory-Based Ways to Enrich the Child's Daily Environments

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Schaaf, R. C., & Smith Roley, S. (2006). Chapter 13: Sensational ways to play. In *Sensory integration: applying clinical reasoning to practice with diverse populations* (pp. 195-242). Austin, TX. Pro-Ed, Inc.

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SECTION 1: SENSORY-BASED WAYS TO MODIFY/ENRICH THE CHILD'S DAILY ENVIRONMENTS

A child's home, school, and community provide many opportunities for learning and exploring his or her world through touching, moving, seeing, hearing, tasting, and smelling. Even more information is provided when the child moves and actively experiences these sensations. Learning opportunities presented in the context of play entice children to further interact with their world. The following activities provide sensory-enriching experiences that may help a child learn to integrate the essential information to develop and grow.

Be aware that each child has individual sensory needs. Typical levels of sensory information may overstimulate some children, so it may be necessary to modify the environment to help the child regulate his or her responses to sensation. For other children, it is necessary to enrich the environment so that it provides the needed levels of sensory stimuli.

Activities Rich in Proprioceptive Sensation

Proprioception is the sensation that has been observed to help children regulate their responsiveness to sensation (Blanche & Schaaf, 2011). Proprioceptive occurs when we move our muscles. Movement of our muscles against gravity or against a weight increases the amount of proprioceptive stimuli.

Home activity suggestions:

- Play on pull-up bars (can also be installed in doorways)
- Jump on a trampoline
- Use in-line skates or roller skates
- Ride a scooter or bicycle
- Jump or climb in and out of inner tubes
- Participate in climbing activities (such as playground equipment)
- Play running and jumping games
- Swing from the trapeze bar
- Play in a sandbox with damp, heavy sand
- Push a child's cart filled with cans or plastic bottles filled with sand or water and then put them away on a low shelf. It is especially useful if the child is on hands and knees (a weight-bearing position) to increase proprioceptive input.
- Color a rainbow with large paper on the floor or with sidewalk chalk while on hands and knees
- Put heavy objects in a cardboard box and have the child push it through cones – “driving a car”

- Make a house with small doors out of a cardboard box and have child squeeze in and out
- Participate in activities such as gymnastics, horseback riding, wrestling, karate, and swimming (can also have the child dive after weighted sticks thrown in a pool)
- Bounce on a bouncy ball with a handle
- Jump on a pogo stick
- Play jumping games such as hopscotch and jump rope
- Things to climb on (climbing provides proprioceptive input through the arms, legs, and trunk):
 - Balls
 - Crash cushions
 - Mats
 - Rock wall
 - Large bolster laying on angle
 - Tables and chairs
 - Tumble form stairs
 - Rope ladder
 - Tumble form barrel
 - Large inflated mats/cushions
 - Large boxes
- Play “going "going camping" by pulling a heavy blanket across a few chairs
- Fill a pillowcase with a few stuffed animals in it for weight; the child can then push or pull the pillowcase up a ramp, incline, or stairs
- Encourage one child to pull another child in a blanket around the floor
- Push against a wall
- Fill up big toy trucks with heavy blocks, pushing with both hands to knock things down

- Play "cars" under the kitchen table where the child pushes the car with one hand while creeping and weight bearing on the other hand
- Stack chairs

Proprioceptive rich activities during the course of daily activities and routines:

- Unpack heavy groceries
- Carry heavy items (baskets with cardboard blocks, groceries, etc.)
- Climb into weighted blankets for bed
- Push or pull boxes with toys or a few books in it (more resistance is provided if boxes are pushed/pulled across a carpeted floor)
- Take the cushions off sofas, vacuum under them, and then put them back; can also climb on them or jump and "crash" into them
- Go "shopping" with a child's shopping cart filled with items, or have the child push the shopping cart when you go shopping
- Rearrange bedroom furniture
- Put large toys and equipment away
- Do chair push-ups

During transition times try the following activities rich in proprioception:

- Roll, walk, or run up a hill
- Wheelbarrow walking
- Open and close the door for other people
- Walk up a ramp or incline
- Wear a heavy backpack or fanny pack
- Do animal walks (crab walk, bear walk, army crawl)

Have the child participate in household chores that provide "heavy work" or proprioceptive input:

- Vacuum
- Sweep

- Mop
- Dust
- Empty trash
- Carry or wheel trash receptacles to curb for garbage pick-up
- Carry the laundry basket
- Load and unload the dryer
- Wipe off the table after dinner
- Push chairs under the table after a meal
- Carry buckets of water to clean with or to water flowers/plants/trees
- Clean windows or the fronts of appliances, using a spray bottle
- Scrub rough surfaces with a brush
- Help change the sheets on the bed (then toss the linens down the stairs)
- Cooking activities – stir, mix, chop, roll out dough, etc.
- Bathe the dog
- Wash the car
- Perform yard work such as:
 - Sweep the step, patio or doorways
 - Mow the lawn
 - Rake the grass/leaves
 - Push the wheelbarrow
 - Shovel sand into a wheelbarrow, pushing the wheelbarrow to a spot, dumping out sand and using a rake to level it out (functional for filling in low spots in backyard)
 - Dig dirt to help plant flowers

Just for fun

- Push a friend in a wheelbarrow
- Pull a friend or heavy items in a wagon
- Give and get hugs
- Carry heavy cushions
- Have pillow fight
- Fill up big toy trucks with heavy blocks, push with both hands to knock things down
- Make wood projects requiring sanding and hammering
- Play a pushing game where two people lock hands facing each other and try to see who can push and make the other person step back first. Use other body parts also, but be sure to have rules (no hitting, no biting, no scratching, if one person says stop then both stop)
- Have two children sit on the floor, back to back, with knees bent and feet flat on the floor; interlock arms, and then try to stand up at the same time
- Have two children play "Row, Row, Row Your Boat" sitting on the floor, holding hands, pushing and pulling each other
- Do yoga

In between mealtimes:

- Chew gum or other foods that provide resistance
- Do oral motor activities with acceptable items to explore orally like whistles, blowing bubbles, chewing gum, using color blow pens, etc.
- Drink thick liquids (e.g. milkshakes, applesauce) through a straw; the thickness of the straw and the thickness of the liquid can be carried to change the degree of heavy work (“sucking”) required

Heavy Work and Proprioceptive Activities for the Classroom:

These activities are especially useful if provided before class/homework activities (see Section 4):

- Do wall push-ups with claps in between
- Use stretchy bands to pull on and make body movements, or tie the band to chair legs for pulling with hands or pushing with feet

- Use a weighted vest, heavy shoes, fanny pack, or weighted hat
- Wash desks and/or chalkboard/dry erase board
- Help rearrange desks in the classroom
- Erase the chalkboard/dry erase board
- Place chairs on desks at end of day or take down at beginning of day
- Help the janitor with emptying wastebaskets, mopping the floor, etc.
- Fill egg crates (small ones that students can carry) with books to take to other classrooms. Teachers could ask students to move these crates back and forth as needed
- Clip clothespins to the side of a can or other container
- Have the child help the gym teacher move mats, hang them up, etc.
- Take chewy breaks with licorice, chewy candy, soft pretzels, or bagels. (Be aware of the child's dietary limitations, food and other allergies, and caregivers' food preferences for the child.)
- Take crunchy food breaks with dry cereal, vegetables, pretzels or popcorn
- Sharpen pencils with a manual sharpener
- Cut out items for display from oak paper
- Carry appropriately heavy notebooks to the office or from class to class
- Carry books with both hands hugging the book to the chest
- Push the lunch cart or carry a lunch bin to the cafeteria
- Staple paper onto bulletin boards
- Have student move several packs of Xerox paper from the storage area to the school copy center
- Use manual paper cutting machine: students can collect orders from teachers (who provide the paper and use these cut-outs for bulletin boards, etc.) and then press out the number of pieces required under the supervision of an adult
- Climb on playground equipment
- Swing from the trapeze bar

- Perform sports activities that involve running and jumping
- Run around the track at school
- Push against a wall. (For younger students, you can use the idea that “The room feels small this morning. Can everyone help me push the walls out to make the room bigger?”)
- Fill up big toy trucks with heavy blocks, push with both hands to knock things down
- Have the student color a "rainbow" with large paper on the floor while on hands and knees
- Play "cars" under a table in the classroom where the student pushes the car with one hand while creeping and weight bearing on the other hand
- Open doors for people
- Use squeeze toys that can be squeezed quietly on the student’s lap under the desk so that the student does not disturb the class
- Do chair push-ups
- Do animal walks (crab walk, bear walk, army crawl)
- Jump on a mini trampoline
- Stack chairs
- Take isometric exercise breaks, for example, placing arms against chair and pushing

Activities Rich in Pressure-Touch Sensation

Pressure-touch is tactile stimuli that consist of sustained tactile sensations with mild to moderate force to the skin receptors. Pressure-touch is thought to be organizing and calming for children who are over-responsiveness to sensation (Blanche and Schaaf, 2001). The following are suggestion for a ctivities that provide pressure-touch sensation:

- Play “steam roller” – children take turns laying on the ground and rolling over each other
- Sandwich the child between pillows, couch cushions, and/or blankets
- Provide firm towel rubbing after bathing or swimming
- Wrap up in a big towel after bathing and sitting on parent’s lap with hugs
- Give child bear hugs

- Play in sandbox with damp, heavy sand
- Hide under a bean bag chair, between two bean bag chairs, or between cushions
- Play “turtle” - crawling around with a bean bag chair resting on the child’s back
- Provide and receive massages
- Make mummy wraps – wrap child up with an ace bandage
- Play “bulldozer” – roll a large ball over the child

Activities Rich in Tactile Sensation

Tactile activities are those that provide touch or texture or to the skin. Tactile activities help children gain awareness of their bodies and are useful for helping children learn to move and manipulate their body and hands in a coordinated, planned manner. The following are suggestions for activities that are rich in tactile sensations:

- Going to a petting zoo
- Cuddle stuffed animals or favorite blankets
- Messy play with hands in pudding, yogurt, ice cream, mashed potatoes, cookie dough, etc.
 - Children can draw letters and shapes or find hidden objects
- Manipulate various putties into shapes and letters - clay, gel bags, etc.
- Find objects hidden in a container of sand, beans, macaroni, rice, corn, packing peanuts, feathers and pompom balls, foam wedges, buttons and beads, dirt flour and sugar mixture or cinnamon and oatmeal, etc.
- Water play with squirt guns, water balloons, and spray bottles
- Provide and receive foot, head, back, hand and body massage
- Write and color with a vibrating pen
- Squeeze or walk on bubble wrap
- Textured balls, cloths, mitts
- Feel magic bags filled with surprises

- Find/identify objects hidden from view
- Finger paint – add texture with sand or rice for variety
- Apply lotion after bathing with firm pressure
- Warm towels/clothes with blow dryer after bath
- Dry off from a bath/shower with a warm towel
- Walk barefoot outdoors on a variety of surfaces
- Go to the beach and feel the sand and sea spray
- Paint body parts with powder, cornstarch, etc., using a brush or feather
- Play pretend shaving using shaving cream on legs and arm and a popsicle stick to “shave” off
- Rub arms, legs, etc. using a variety of textures- feathers, carpet samples, dry washcloths, felt, fake fur, etc.
- Draw with shaving cream, whipped crème, or pudding – add sand or rice for texture
- Play carpet games, such as commando crawling, rolling, making angels
- Play with the child to roll over different surfaces such as blankets, carpet, leaves, grass, sand, etc.
- Draw letters and shapes with chalk on a carpet square and erase them with hands or feet
- Have child identify shapes, letters and numbers drawn on his or her arm, leg or back
- Play washing machine - put 1- or 2-inch balls in a large bag or sheets sewn together to make a bag, have child crawl in, shake it up, and wash the child

School-Based Tactile Activities

- Beanbags or weight lap pads for child’s lap
- Fidget toys
- Bear hugs
- Classroom fidget basket filled with manipulative toys

Activities Rich in Vestibular Sensation

Vestibular activities include any movements that involve the head moving through space. To stimulate the vestibular system use activities that are stop and go and that occur in a variety of planes. For the child who is overly sensitive to vestibular movement, or who needs calming, use vestibular sensations that are in the linear plane and that are slow and rhythmical like swinging or rocking.

Swinging and Sliding Activities:

- Have the child sit on swing and drop beanbags placed between knees or feet onto a target
- Have child stand on swing (with supervision) and jump off into pillows or inner tube
- To teach pumping, have child extend legs as swing moves forward so therapist can push on bottom of his or her feet

For a child that likes/needs intense vestibular input:

- Hang the swing from single point so that movement occurs in more planes, including rotational plane
- Add proprioception to vestibular activities to help the child who gets overstimulated easily, by having child bump into therapy ball, kick ball with feet, knock over bolsters, or pull child by ankles
- Use sitting disc (inflated, cushioned disk) for child during homework or mealtime
- Ride tricycle/bicycle
- Take stroller rides
- Go sledding
- Go on amusement park rides
- Dance
- Jump on a trampoline
- Do cartwheels and/or somersaults
- Use rocking horse or rocking chair/glider
- Play on toys that spin
- Somersaults

- Play Ring Around the Rosy (“we all clap hands... hop around...squat down...jump”)
- Sit on parent’s lap and rock back and forth or bounce up and down
- Roll or bounce on big balls
- Log roll to knock over blocks, plastic bowling pins
- Roll down an incline/small hill “ like a log”
- Swing in hammock – two adults and a blanket can form a hammock swing for very small child
- Go roller skating or ice skating, rock climbing, or horseback riding
- Ride a scooter
- Bounce on a ball (balls with handles are useful for children to bounce independently)
- Twirl self around while standing or seated in an office chair
- Play on merry-go-round, slides, trolley swings, teeter-tooters or other moving playground equipment
- Use swings during recess

Activities Related to Praxis*

*Many of the activities suggested are appropriate for home, clinic, school, and community settings.

Ayres (1989) showed that there is a relationship between sensory processing and praxis, specifically somatosensory processing (Blanche, 2011). Sensory information from the body and the environment is necessary for creating ideas for movement, putting together the plan, and providing feedback during and following the movement activity. Many children with difficulties processing sensory information also have poor motor planning or dyspraxia. Listed below are activity suggestions that require praxis. Many of these activities also provide significant somatosensory input, thus, underscoring the relationship between body awareness and praxis as Ayres recommended.

- Riding tricycles and bicycles
- Participate in activities such as gymnastics, horseback riding, wrestling, karate, swimming (e.g. child can dive after weighted sticks thrown in pool)
- Create and complete an obstacle course
- Participate in imaginative play (housekeeping, fireman, doctor, post office)
- Ask the child to perform animal walks

- Play “Simon Says” games
- Sing songs with movements
 - Do the Hokey Pokey
 - The Itsy Bity Spider/The Big Hairy Spider
- Play balloon volleyball
- Play “mirror image” - child makes a mirror image of another child’s posture
- Play red light/green light - child runs on green light and stops on red light
- Play follow-the-leader - leading and following

Section 2: Imaginary Play Activities and Creative Play Themes

These activities help motivate children to engage in typical play, including pretend play." It is helpful to have props readily available for the child (see list of props below).

Creative Play Themes

“I’m all grown up”

- Classroom teacher
- Mom, dad, grandparent, or other family member
- Business person
- Attorney
- Nurse, dentist, or doctor (doll or stuffed animal is ill)
- Mail person
- Chef (great for children with feeding difficulties) – support child to make simple snack and explore foods with vision, touch, smell, & taste. Have child make snack for parent or therapist, may spontaneously lick fingers
- Other community people such as banker, grocery clerk, lifeguard, etc.
- Therapist

- Babysitter
- Role Reversals – child is therapist/therapist is child, child is parent/parent is child, child is adult/therapist is infant
- Director, producer, film maker

“I’m on an adventure”

- Space travel
- On boat in ocean/avoid dangerous sea creatures
- Travel to different exotic locations
- Rocket ship/Moon travel
- Racecar with scooter board - steer car by pulling left or right on hula-hoop: “crash”, stop, and “fix” the tire or “repair” the car
- Jungle theme
- Circus theme

“I have work to do”

- Cooking, baking, gathering pretend ingredients
- Go shopping (for groceries or clothing)
- Post office
- Beauty salon where child can style doll’s hair using rollers, hairpins, etc.
- Clean house
- Repairs
- Driving for pickups and drop offs
- Going to the office

“I’m taking a break”

- On vacation
- Going to visit someone

- Going fishing (what about ice fishing with real ice)
- Going surfing, body boarding, skim boarding
- Going to the movies

“I’m just pretending”

- Act out favorite TV programs
- Movie stars
- Super heroes
- Bad guys
- Fantasy figures – cartoon characters
- Political figures, president, king, queen, general
- Best friend, pretend friend, pets

Props and Equipment to Facilitate Creative Play

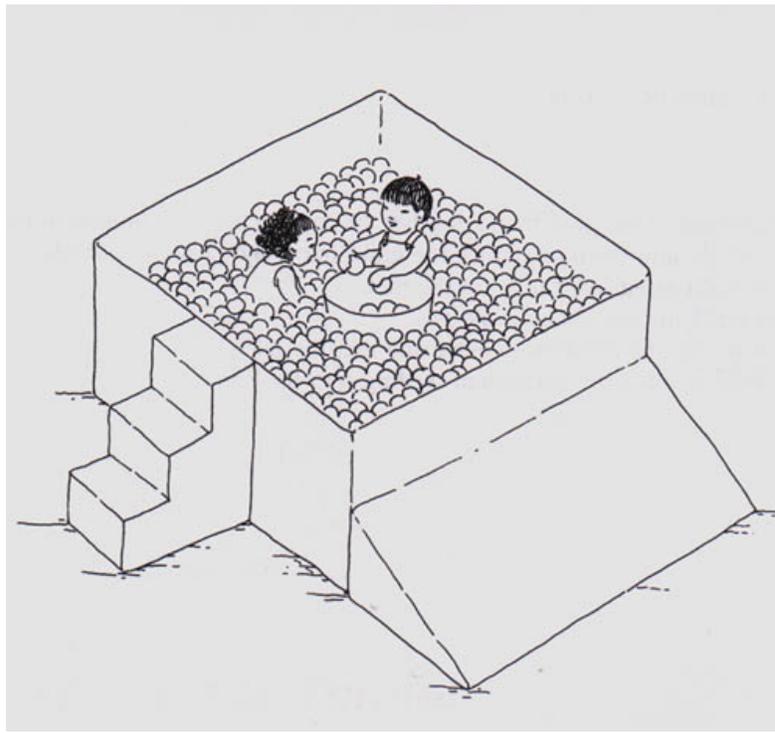
- Colorful carpet with squares and shapes to make roads
- Fabric tunnel
- Clothes and accessories for dress-up
- Puppets, marionettes, action figures, dolls
- Puppet theatre (PVC pipe, fabric and a table)
- Scarves, mittens, gloves
- Crayons, markers and other utensils to draw/color with
- Sets of large wooden blocks
- Child size tools
- Wood and other construction materials
- Play kitchen equipment

- Video camera – record and playback
- Toy telephone or walkie-talkies
- Sports equipment (e.g., plastic bat, whiffle ball, foam basketball)
- Tricycles
- Bouncy balls
- Pipe cleaners and bendable wax sticks
- Animal beanbag toys
- Bubbles/bubble toys
- Squirt guns
- Sidewalk chalk
- Hair clips
- Face paints
- Wigs and hats (be careful of lice)
- Large shoes
- Uniforms and costumes
- Hats - fire hats, funny hats, helmets, etc.
- Aprons with large pockets
- Chalk and chalk board
- Cardboard boxes:
 - Cardboard bricks filled with baggies of rice to create weight
 - Stack them
 - Stack them like bowling pins and throw ball (e.g., medicine ball) at them to knock them down
 - Color on them

- Make houses – use as transition to tunnel to allow child to tolerate enclosed spaces
- Color animals on and make “cages” out of them. Have child go in and out of each “cage” to feed the animals
- Go down ramp on a scooter board and crash into large cardboard boxes
- Create spaces to climb in and under and crash into

Section 3: Activities Using Specialized Sensory Integration Equipment

Most equipment described below is available commercially from vendors who sell specialized equipment for pediatric rehabilitation.



Ball/Bath Pit Activities

What it is: A large area filled with small plastic balls. Can be purchased commercially or made out of a child’s blow-up swimming pool.

- Hide plastic letters in pit. Child sees clues and identifies/writes letters/words

- Go “shopping” for balls with cart; throw the collected balls into the pit; shop for other items to throw into the pit
- Play hide and seek
- Burrow under small weighted balls in ball pit for deep pressure input; have child try to push as many balls to one side of the pit; see how high the child can make the pile
- Have child roll from one side of ball pit to the other side to retrieve objects or complete or sequenced parts of a task
- While seated in ball pit, throw balls at a target that’s moving back and forth on the other side of the ball pit (e.g., suspended balloon)
- Play in ball pit by moving from one end to the other
- Climb in and out of ball pit
- Jump into the ball pit. To increase the challenge, place a tire (inner tube) in the ball pit and have the child jump into the center of the tire. A blanket or pillow can be substituted for the tire and have the child jump onto these items
- Use a suspended trapeze or rope and swing into the ball pit
- Walk around the ledge. To increase the difficulty, have the child pick up beanbags placed all around the ledge while maintaining balance on the ledge and throw the beanbags into a target; place blocks or obstacles all along the ledge for the child to step over
- Have the child standing on the ledge, therapist then throws a beanbag and child jumps into ball pit and catches the beanbag simultaneously. (bubbles can be substituted for the beanbags)
- Place a long platform swing over the ball pit and have the child walk across it; he child can pick up beanbags or other objects in the ball pit while maintaining balance on the platform swing; to increase the difficulty using a narrower bolster or a balance beam across the ball pit; have child walk across pillows placed on the balls
- Tug of war - Have the child and therapist stand on ledge on opposite sides; both pull on rope, attempting to pull the other into the ball pit
- Child and therapist (or another peer) stand on ledge facing each other; both have their hands placed on the other shoulders; the goal is to knock the opponent sideways into the ball pit
- While jumping into ball pit, imitate body positions or number of claps
- Throw balls at a target
- Cover the child up with balls/blanket/pillow

- Have the child go under the balls, covering entire body with balls
- Fish for treasure (beanbags or other items) that the therapist hides in the ball pit (and remember to find all treasures and remove them before moving on)
- Touch child and ask child to identify body part
- Incorporate identification of colors, matching, or counting

Barrel Activities

What it is: Vinyl, soft foam or carpeted barrel which ranges in sizes and length, Child can roll over or crawl through.

- Steam roll over child
- Carpet-barrel sensory tunnel on part of obstacle course
- Child can go inside with a ball or pillow over top to decrease arousal level if over-stimulated
- Child is inside barrel, therapist rolls him/her to an object and child gets it and returns
- With a tumble form barrel, pretend child is a duck, and have him/her dive in head first to get the “fish” (beanbag) and then push him/herself up and out of it
- Child can straddle it and pretend it’s a horse

Bolster Swing Activities

What it is: Padded bolster attached with ropes. Typically comes in two different sizes.

- Work on pumping legs while sitting and holding onto ropes
- Hang upside down and crash down onto soft mat
- If won’t hold on, use rubber strips or rope
- Place stickers on bolster part and ask child to find a certain sticker and give it to the therapist or place onto a blank paper that is hung on wall
- Child is a koala, and lies prone with arms and legs wrapped around bolster. Child hangs on while “storm” blows and shakes the “tree branch” and then crashes off onto mat
- Play bumper cars
- Have one child sit on each side and engage in basketball play
- Balance beam in air as part of obstacle course to get from one piece of equipment to another

- Crash & fall into beanbags and climbing back onto swing
- Have child hold on tightly and hang from underneath to play “monkey”. Therapist shakes the swing to try to shake “monkey” out of tree
- Lay prone to facilitate neck extension, while varying speed
- Attach trapeze to facilitate co-contraction
- Child uses both hands to hold on while pumping in sitting, sitting sideways, kneeling, kicking a ball, and standing for balance
- Kneel and catch/throw objects with one hand for balance, postural control, and timed action sequence
- Hang clothespins along the top rope to add a fine motor component
- As part of an obstacle course, climbing over/under/across
- Attach a blanket over rope to make a tent
- Crash from a fast moving bolster into a large pillow to facilitate postural control
- Have the bolster become a Bucking Bronco, horse, ship, airplane, or spacecraft
- Knock over bolster to increase proprioception and active muscle contraction to propel swing
- To increase strength and proprioception for modulation, have children take turns pushing each other

Crash Pillow Activities

What it is: For example, body pillows, large bean bags, covered old mattresses.

- Crawl over in a tunnel
- Put tunnel between a few pillows to make a sandwich
- Swing on trapeze and crash into pillows
- Jump onto pillows from trampoline
- Use to walk over
- Put in a zippered mattress cover with foam pieces (can get foam pieces donated from upholstery store)
- Roll large ball over them

- Run and jump onto pillows (try flipping onto back when landing instead of on stomach)

Flexion Disc Activities

What it is: Swing with a carpeted base 24” or 30” diameter with a heavily padded edge and padded center post.)

- Hold tightly around middle portion of swing, with stomach up against it, and reach for items with one arm
- Stop swing suddenly while child is swinging

Frog Swing Activities

What it is: Sling seat swing attached to two ropes which join together overhead and attach to a bungee/vertical stimulation device.)

- With swing positioned low, child can lie supine in swing, hold onto a theraband loop tied to horizontal bar above swing, and flip backwards off the swing
- Have the child lie on tummy and fly like superman with arms and feet out, pushing initially with feet
- Have child lie on tummy and hold onto a trapeze or rope to propel swing
- Have child lie on tummy and pick up beanbags and/or balls, etc., to throw at or into a target
- Have a child lie on tummy and knock down bolsters or push large therapy balls with hands and/or feet
- Have two children each on a frog, or one on frog and one on another swing. Have them each hold one end of a rope or trapeze and pull another to propel each other
- Put frog swing on the glider, have a child lay on tummy and hold a rope, pulling up hand-over-hand to reach the top of the ramp or other structure
- Have a child sit up on the frog and hold the end of a long rope. Wrap the rope around the top of the swing (away from the child’s head) and pull slowly to make the swing spin. When the swing begins to spin the opposite way, the rope will re-wrap itself and you can pull again!
WARNING: this is only for children you are sure enjoy fast rotary movement and can hold on without difficulty

Bouncing Ball and Ramp Activities

- Two children can have a race up the ramp while sitting on a bouncy ball (the type with a handle for safety)

- Fasten two ramps together at right angles and let the child hop up one, cross to the platform of the second ramp, and hop down

Inner Tube Activities

What it is: Rubber inner tube with hold in the middle.

- Put the inner tube on the floor and bounce around the outside of it sitting one-way, and then reverse and go the opposite way
- String them together to make a tunnel
- Step or jump in and out of the inner tube(s) as part of an obstacle course
- Put inner tubes on platform swing
- Stack inner tubes up and climb on top and bounce, while holding on to therapist's hand or rope of swing
- Push/roll them to each other as part of obstacle course
- Stack inner tubes with child in the center holes; child must squeeze out between two inner tubes
- Straddle a suspended inner tube and bounce by pushing feet off the floor (may use with bungee attachment on suspension system)
- Line inner tubes up on the floor and play leap frog, jumping from one inner tube into the next

Activities for a Large Innertube Placed on the Ground

What it is: Large rubber inner tube placed on the ground with padded poles extending vertically. Children jump on inner tube while holding onto poles

- **Make a fort:** Offers small space, deep pressure from pillows, proprioception (climbing in and out), fine motor prehension/pre-scissor skills when using clothes pins to pin up blanket. Have the child help gather materials, blankets, pillows, and clothespins. Then pile pillows/blankets etc. and jump inside. Pin the blankets to Chinese jump rope (usually on jumparoo) to make walls
- **Over/Under:** offers proprioception and opportunities for motor planning. Tie a rope to a vertical bar of jumparoo, child jumps around jumparoo and has to go over or under the rope. The rope can be placed at a variety of heights and adding multiple ropes to further challenge motor planning
- **Get the treasures:** Offers proprioception and opportunities for motor planning and timing. Put heavy beanbags or socks on top of inner tube. Have the child jump as high as they can to retrieve the Treasures from various points on the inner tube.

- Jumping off: Offers proprioception and opportunities for sequencing. Have the child use jumparoo as a jumping off point for larger obstacle course (maybe involving other sized tires)
- Chase game: Offers proprioception and opportunities for social interaction and gross motor coordination. Have the child participate in a chase around the jumparoo with therapist or another child

Moon Swing or Space Ball Activities

What it is: Moon swings (red and blue bag) and Space Balls (yellow and blue bag) are gooseneck shaped padded swing with two different types of inserts: soft/fine foam or stiff soft shape.

- Hang the moon swing or space bag and use it as a swing (over a large cushion)
- Hook the space bag onto the glider for bilateral coordination and flexion
- Hook the space bag onto the glider and drop onto cushion for timing and motor planning
- Hang the space bag and have the child and therapist stand on each side of swing to punch, catch and/or kick it
- Hang space bag and have the child hit it with a bat for eye-hand coordination
- Kick the swing to facilitate a one-leg stance
- For high level motor planning, hang by hands on a trapeze while sitting on space bag. First move legs then upper extremities onto moon swing
- Incorporate crashing into pillows for heavy proprioceptive input
- Incorporate timing by jumping off into ball pit or pillows

Net Swing Activities

What it is: Heavy-duty nylon or cotton new suspended from 2 steel rings; can be attached to a Spreader bar (a wooded bar with two rings). The therapist can also put a therapy pillow inside for comfort.

- In prone position, climb up stretchy elastic band using hand-over-hand pattern, to climb to top of the mountain to retrieve a toy; then let go
- Therapist pushes different colored hand towels through the holes and the child tries to pull them through one at a time while swinging
- Throw ball while swinging

- Therapy ball is placed in net swing & tied at the top; straddle/hold the net at top while sitting on the ball
- Close child in by putting rope through various holes of the swing, and have him/her get out as independently as possible – good for praxis & proprioception
- “Fly” in prone position
- In prone position, with swing at low height, crawl along floor using hands or weight bear on hands to find puzzle pieces
- In prone position, with swing at low height, have child pick up beanbags to knock down a castle/tower of blocks
- Sit in net swing “cave” and try various oral motor toys or tastes

Platform Swing Activities

What it is: A square wooden base with padded edges, a removable carpet and four suspension ropes that are attached to a top disc; control loops can be unsnapped for greater range of motion.

- Clip clothes pins on ropes or carpet
- Stand on swing and jump on crash pad
- Pile inner tubes on swing, stand & reach to knock over bolsters with bopper
- Play an “I spy” game to work on vision, or “Can you find a ____ on the wall?”
- Pick apples (putty balls) off the wall that are placed at various heights
- Spin and stop on command while in prone position
- Stand, holding on to ropes with hands, and pumps with the feet
- Step to get onto loft while hanging in air
- Child can be on the “boat” either seated or prone and another child (or therapist) can roll therapy ball “whales” at child; child on boat has to kick or punch at whales to keep them away from boat and from eating the child
- While seated or prone on swing, child can climb up one end of rope while another child or therapist holds onto the other end; child on swing can let go of rope when he/she reaches other end (after giving warning to person holding the rope) and swing
- Make a cocoon over the ropes by wrapping neoprene around the platform

- “Go fishing” with puzzle pieces scattered on floor while in prone position on swing – using upper body to self-propel
- Position child in prone on swing for weight bearing on upper extremities
- Incorporate changing positions (e.g., going from stand to kneel) for balance while moving
- Have swing be a surfboard, plane, horse, elephant on safari, spaceship, or submarine
- Surf with swing over small bolster (not hanging) with child holding onto trapeze overhead
- Reach for items on floor (balance) or on other parts of swing (for trunk rotation, crossing midline)

Platform Glider Swing Activities

What it is: Similar to above platform swing mentioned above, but longer. Children can stand, sit or kneel.

- Change position (e.g., sit to stand, kneel to prone) while swing is moving
- Child, seated in prone position, pulls & pushes ropes to move swing; therapist is seated on floor approximately two feet away from swing; child’s head “hits” therapist’s, and therapist falls over, stops swing, and begins again
- Sit on large bolster and ride it like a rocket ship
- Lie prone and pull on rope suspended from ceiling
- Use as part of obstacle course to climb on and off of, and switch positions from sit to kneel
- While holding onto handles shoot through the inner tube hung at the end of the line
- To increase body flexion, keep a sock under chin while going down the glider on the rope or by handles
- Stack the weighted boxes under the glider wire and have the child flex their hips and knee and gradually increase their height or have them kick the stack of boxes or pillows over crash
- Drop items at various spots along the way dropping the mail or delivering the package
- Play Car Wash - attach a wire from a hook on the wall over the glider wire and secure to a hook (so it is going over the wire horizontally) and hang blankets, etc. over it so they will brush the child as they go through them
- Have the child drop themselves into a stack of tires/inner tubes or a barrel in a timed release at various locations along the line of the glider

- Have the child ride the glider facing new directions, not just towards the front
- Attach various swings that increase in complexity, a frog swing in prone, moon swing, to hanging inner tubes and holding on, even 2 children riding together

Ramps/Steps/Ladders Activities

What it is: Ramps - wooden platform base with detachable ramp. Ramps may have a lip that hooks onto base. Steps - foam or wooden. Ladders - made of wood and rope, which can also be hung as a swing if 2 hooks are attached

- Lay ladder on floor and have child step in space between rungs (for praxis and vision)
- Stomp your feet hard/soft on verbal command
- Ramps:
 - Ride into a stack of cardboard boxes
 - Ride through a tunnel or a cardboard box
 - Touch crepe paper streamers above head
 - Bump into a mat
 - Fall off and roll onto mat
 - Catch a ball or beanbag
 - Ride and spin
 - Knock over bowling balls with two arms
 - 6"-8" piece of stretchy elastic band held across the floor; the child goes down a ramp with arms extended, grabs theraband (great co-contractions)
 - Pull self up ramp with rope using hand-over-hand movements

Rubber Strips or Rope Activities

What it is: Rubber strips can be strong elastic bands or bungee material. Rope can be purchased from a hardware store.

- Tie the rope at 2 points approximately 3 feet from the ground; have the child pull the rope using his/her hands and feet while seated, lying supine, or prone on a scooter board
- Pull to a specified marker with the rope while on a swing

- Pull on rope that hangs from ceiling hook while seated in inner tube on swing
- While lying prone in net swing, have child use hands to climb up rope suspended from ceiling hook to get clothespin clips off rope
- Climb rope hanging from ceiling hook with hands and then let go to “fly”
- Therapist ties big ropes in knots and has child untie them
- Tug of war game
- For one-person tug-of-war, tie one end of rope to something secure and child pulls on other end of rope
- Therapist wiggles rope back and forth on the floor and child has to jump over the other end of the rope when it approaches him/her
- Tie rope to two points and play limbo
- Two people hold rope close to ground while a third child jumps over it. Raise rope higher each turn to see how high child can jump or walk over the rope
- Use thera-tubing tied to chair legs to pull with hands when fidgeting

Scooter and Ramp Activities

What it is: Scooter has a wooden or plastic base approximately two feet square with four wheels attached. Child can sit, lie prone or kneel on scooter. Scooter ramp - wooden platform base with a wooden ramp that can be attached.)

- Use rope to climb up ramp while prone on scooter
- With two children, one child can pull the other child up the ramp with the rope
- Roll items on scooter up ramp
- Go down ramp on scooter board & push over set of bolsters – like bowling
- Have puzzle pieces at one end of the room, and look to find matches at the other end by going across room while prone on scooter board. If incorrect, return back to the other end and try again
- Put pieces required for the task at one end of the room, and complete the task at the other end, moving from one side of the room to the other while prone on scooter board
- Performing the above two activities across a carpeted floor provides more resistance
- Push the therapist or another person around on a scooter board

- Have one child use a rope or Hula Hoop to pull another child who is sitting or lying (on his/her stomach) on a scooter board, holding onto the other end of the rope or the Hula Hoop
- Have the child pull him-herself (using hand-over-hand movements) by a long jump rope tied by one end to a doorknob while seated on a scooter board with legs crossed and off the floor. You can also have one child hold one end of a jump rope while another child, who is sitting or lying on a scooter board, pulls him/herself with the other end of the rope up to the child holding the rope.” A variation is to play “army jungle maneuvers” where the child on the scooter board delivers secret messages to the other child, and that child (who is holding the rope) has to write a secret answer back to the commander (therapist). This could be incorporated into academics in lots of ways. For example, the first child can take a math problem to the second child, the second child solves the math problem and sends it to the commander (therapist)
- Find a hallway area and have the child lie prone on a scooter board. The child is positioned with feet on the wall behind him/her and pushes forward with hands in front to stop him/her (before crashing). Child can push back and forth from wall to wall (Obviously, children with delayed processing, motor planning difficulties, etc. are not appropriate for this activity. Also, a helmet should be worn if there is any concern that the child would be unable to react appropriately to this activity)
- Rotate while prone (passive)
- Pull child while they hold onto a rope
- While prone, child pulls self on rope
- While prone, child spins him- or herself
- While supine or prone, child pushes self off wall with two feet
- Paddle with hands while prone
- Pull self along with suspended ropes
- Propel self along mark path or obstacle course
- Play hockey, soccer, or basketball with another child
- Pull self back and forth with suspended bungee cord
- While prone, push self laterally between two walls
- While prone, pull child with hoop
- While prone, child holds onto stretchy elastic band with two hands as therapist propels child in a circle around therapist at varying speeds

- Hold a stretchy elastic band (about 10') across floor held about 6" off floor; two children prone on each side of theraband, move together and apart rhythmically; two children on same side of theraband move forward and back together
- Therapist holds about 3-4' of stretchy elastic band, one end in each hand with legs spread apart about 3' while child is prone on scooter board; therapist leans forward and gives child the stretchy elastic band, then pulls child toward therapist; child releases theraband and glides through therapist's legs
- Scooter board tag
- Place a beanbag on back and carry it across room
- Have child become a turtle by placing a pillow on the child's back

Spandex Hammock Activities

What it is: Soft and stretchy swing made of spandex and attached to ceiling hook with 1 hook.

- Rock child side to side while holding ends
- Good for calming, especially children with autism; use with rope pulling or put a lighted toy inside

Suspended Inner Tube Swing

What it is: Rubber inner tube suspended vertically and supported via a harness.

- Climb all the way to the top and swing like a monkey
- Use as boundary for platform swing
- Dive through it and roll
- Play three-person bumper tires
- Stand on tire to catch and throw
- Put on bungee and straddle tire
- Hang swing up high and put lots of crash pads down around it; have the child climb on, then balance self while seated upright with no hands

Tactile Material Activities

What it is: Water play, clay, putty, homemade gooey substances, wax sticks that can be shaped and molded, noodles, shaving cream, pudding, sand, rice, etc.

- For messy play, have child use tea set or other utensils to mix, stir, or touch textures without pressure to touch them with their hands
- Finger paints mixed with sand or rice
- Use shaving cream mixed with sand
- Draw/write letters with shaving cream or pudding
- Messy play with pudding, yogurt, ice cream, mashed potatoes, cookie dough, etc.
- Manipulate various putties, clay, gooey substances, gel bags, etc.
- Cover floor with shaving cream and let child slide in while holding trapeze, then move to kicking balls, then moving balls while sliding through shaving cream
- Use sand paper, play dough, sponges on a chalkboard, rugs, wikki sticks and putty for kinesthetic learning of ABCs
- Textured balls
- Find small objects hidden in sand, rice, noodles, shredded tissue paper or beans and identify object without looking at it
- Water play
- Vibrating pen or ball
- Feely bags
- Carpet games- commando crawling, rolling, angel making
- Rolling over different surfaces such as blankets, carpet, leaves, grass, sand, etc.
- Homemade gak or goo
- Make edible dough (e.g., chocolate, pumpkin)

Homemade Dough

What You Need

2 cups flour

1 cup salt

Water

Oil, optional (if you do not want it to harden)

Medium sized mixing Bowl

Spoon

How to Make It

1. Mix the flour, salt, and water into a bowl. Add a small amount of oil if you do not want the dough to harden.
2. Knead the dough a little and play!

Therapy Balls and Bolster Activities

What it is: Balls: round plastic balls in a variety of diameters. Bolsters - oblong, available in many diameters.

- Push ball through resistance tunnel or doorway
- Push on a large therapy ball with another child or therapist gives resistance from the other side
- Child climbs on top and tries to stay on while therapist tries to shift him/her off
- Place drawing or stickers on top of the ball. Therapist and child sit on either side and try to push the drawing or sticker to the other person
- Place animal beanbag on top of ball and push ball back and forth, trying not to knock the beanbag off the ball
- Stand on top and bounce while holding therapist's hands
- Kick large therapy ball thrown by therapist while in supine
- "Bull doze" wall by knocking down blocks with the ball
- In prone, play wheelbarrow
- Hit back and forth, playing volleyball
- Use as steps to get on loft
- Use as seat on swing for increased flexion

- Play target by throwing at therapist and trying to knock him/her down
- Ball is placed close in front of child while he/she is in prone on a net swing to “mountain climb” by pulling self up onto the ball
- Line up bolsters, from large to small, with about 1 foot between each. Starting from largest bolster, have child run and launch himself, in prone, to body surf across bolsters
- Place large therapy ball inside inner tube to make an island. Child can use it to climb onto another piece of equipment (i.e., space bag), or play a game of king of the island trying to not get knocked off
- Child is prone on ball or bolster and guided to move forward into a somersault



Trampoline Activities

Activities that Facilitate Proprioceptive Awareness

- Bounce and catch medicine ball
- Place one or more balls or water balloons on trampoline and have child jump hard enough to bounce them off; balls can be a variety of sizes, shapes, and textures
- Child jumps independently

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- Knee bouncing
- Jump around the Rosy; after falling down, have the child pull you up by making a big fuss of “HELP pull me up”

Activities that Facilitate Proprioception and Praxis

- Perform “tricks” on command - jump and turn, clap 3 times while you’re in the air, run in place, jumping jacks, etc.)
- Tie bungee cords all over and have child jump in around and through
- Child jumps holding therapist’s hand(s) for a particular number of sequences
- Child hops with alternating feet, or on a single foot
- Therapist demonstrates or verbalizes a specific sequence for the child to execute (e.g., left, right, together)
- Jump on knees, then feet, then knees, etc.
- Catch a ball/throw the ball while jumping on the trampoline
- Have the child jump and do knee slaps bilaterally
- Dodge small pillows thrown by therapist
- Jump like various animals

Activities that Facilitate Proprioceptive and Tactile Awareness and Processing

- Use shaving cream on trampoline
- Water play, squirt guns or hose
- Catch textured balls, beanbags, etc. while jumping on trampoline

Activities that Facilitate Proprioceptive Awareness, Praxis and Visual Motor Control

- Fix up a hoop to play basketball
- Attach a target or ring toss game
- Therapist blows bubbles and the child tries to catch/pop while jumping
- Balloon volleyball while jumping

- Jump off trampoline and catch a small ball simultaneously
- Jump in and out of a hula-hoop or inner tube
- Place an object suspended overhead (e.g. scarf held by clothespin on a string) that the child needs to pull down

Weighted Balls/Beanbag Activities

What it is: Weighted balls - small balls of different diameters that have a weight to them, and are sometimes called a “medicine ball”. Beanbags - can be purchased or made; usually are small squares filled with beans, rice or other weighted materials.

- Go bowling with weighted ball
- Push balls/beanbags through obstacle course
- Throw beanbags at target or to knock over tower of blocks while child is on swing, have child
- Play “musical ball” - like musical chairs, but instead pass the ball and stop the music
- Play catch to ABCs and spelling words
- Play basketball
- Use added weights on platform swing
- Use beanbag chair or crash pillow on top of child as a shell for a turtle; have child crawl around with “shell” on his or her back to look for food, hide, or sleep
- Bounce medicine ball on mini-trampoline for a game of catch
- Have a child hold weighted ball or beanbags while in lap or on back while on a swing
- Write child’s name (or spelling words) out of sequence on a board; have child throw beanbags at letters in correct sequence

Whale Activities

What it is: Oblong swing made of soft flexible foam attached between 2 walls with attachment points.

- Using two whales, see which child can push off the floor and bounce higher
- Straddling a whale, child tries to maintain balance while reaching for objects or batting at a moving objects (such as a suspended balloon)
- Put different objects under feet as a target or springy platform to jump from (can use different heights for each foot)

Vibrating Massager Activities

What it is: Small handheld massagers or pens that vibrate. May be look like animals.

- Hold the massager up to another toy to decrease the input for the child who is reluctant to try it
- Use vibrating pens to increase upper extremity proprioception and grasp strength
- Put under ball for entire body vibration
- Use for arousal in ticking game
- Use to stimulate weakened limbs
- As the child goes around on the swing, touch him/her with the massager and ask him/her to point to the spot or verbalize what part was touched

Visual Target Activities

What it is: Targets can include clown's mouth, buckets, barrels, bull's eye, etc.

- Play "I spy" while child is on moving swing – especially helpful for child with tendency to fixate
- Throw beanbags in clown's mouth
- Throw beanbags in buckets – move buckets to various positions and heights
- Bull's eye - draw bull's eye on a board or on large piece of butcher paper on the floor with letters or numbers for the score; child has to throw beanbags at specified letters or numbers (and practice forming the letters/numbers the beanbag hits)
- Put a blob of shaving cream on a dry erase easel; have child use spray bottle and squirt at shaving cream until it's all gone; can do this with two children and have a race to see whose shaving cream disappears first
- Use magnetic wand to move magnetic bingo chips around a maze or path

Section 4: Child-Directed Intervention Strategies for Improved Sensory Modulation, Self-Regulation, Sensory Perception, and Discrimination

Improving Sensory Modulation and Self Regulation

Regulating Arousal Level

The following activities may be useful to help change the child's level of arousal, thus, increase or decrease his or her activity level. While activities are listed as increasing or decreasing arousal level, Keep in mind that children vary in their responsiveness to the activities, depending on their behavioral state and the context in which they are doing them. In general, activities that include "heavy work" (movement against resistance or weight) will help regulate arousal level (increase arousal for children that are low arousal and decrease overarousal for children who are overstimulated and behaviorally disorganized). In general, fast, irregular, light-touch sensations will increase arousal level, while slow, rhythmical sensations are more calming and decrease arousal level.

Increase Arousal Level

- Provide tart and sour candy, or spicy food
- Loud, fast, and irregular rhythm to alert; soft and slow to calm
- Increase lighting
- Roll in an egg crate to increase arousal level through tactile sensation
- Jump on the trampoline (can also decrease arousal level when used in a controlled manner, i.e.: have child imitate body movements)
- Play in the body sock (can also decrease arousal level due to pressure touch quality)
- Swing (fast, erratic to alert; slow, linear to calm)
- To increase arousal level, provide frequent movement breaks during sedentary activities
- Use light-touch, tactile activities such as drawing in shaving cream
- Olfactory input - scented lotion for massage; scented clay or markers; peppermint (alerting), vanilla or lavender (calming)
- Sit on inflated therapy ball
- Sit on small inflated disk with irregular surface on it

Decrease Arousal Level

- Provide safe “womblike” space: Blankets, pillows, beanbag chair. It can be under a table or in a corner of the room away from the main activity. It should be used as a soothing place chosen by the child or directed by an adult as needed. Allow child to help create this place and encourage him/her to take time there to “slow down”
- Suck on hard candy or sweet foods to calm
- Chewy or crunchy foods are organizing
- Crash cushion “bed” play
- Climb up ladder to get desired objects
- Climb up slide instead of sliding down it
- Slow movements, rocking in a rocking chair, rolling over a ball or bolster
- Vibrating can be calming-riding in a car, vibrating pillow, sitting on washing machine
- Blow on kazoos or other resistive mouth toys
- Lay on mat while large therapy ball is rolled over body
- Deep pressure is calming, such as sandwiching child between beanbags, rolling child in blanket, using weighted blanket, Bear Hug, weighted vest
- Activities that encourage flexion tend to be calming- curling up in a ball on the floor on someone’s lap
- Reduce lighting and noise in the room (ear plugs or small headphones, tapes of soft music, dim lights, sunglasses as needed)
- Soft, rhythmical music
- Deep pressure/proprioceptive input – hugs, firm rubbing of back or extremities, roll a ball or bolster over child, pushing against objects; balls, walls, etc.; wheelbarrow walking; dough or clay activities; push or pull objects like wheelbarrow, wagon; hammer nails, squeeze and cookie cutters; play in mixture of dried corn, rice , beans, or marbles
- Blowing bubbles
- Sucking thick milkshakes or pudding through straw
- Whistles
- Chew gum

Regulate Arousal Through Proprioception

- Have one child pull another, using ropes with handles on the scooter board
- Have two children similar in weight sit in inner tubes, with knees wedged in inner tube, and pull themselves to crash into each other. See who falls out and who can stay in
- Move heavy therapy equipment
- Play catch with Velcro® mitt and tennis ball
- Carry backpack with some “weight” in it
- Do wheelbarrow walking to collect puzzle pieces or constructional activity
- Do yoga or animal postures
- Therapist pretends he or she is too tired to get off the floor and have child help pull him or her up
- Set-up and clean-up obstacle course
- Push therapist in office chair down hallway
- Carry laundry detergent containers filled with water or rice
- Mop mats
- Pulley with weighted bucket
- Climb a mountain of bolsters and crash onto mats
- Play a game of “play wrestling”- two people lock hands facing each other and try to see who can push and make the other person step back first; use other body parts also, but be sure to have rules (no hitting, no biting, no scratching, if one person says stop then both stop)
- Have two children play "Row, Row, Row Your Boat" sitting on the floor, holding hands, pushing and pulling each other
- Have two children sit on the floor, back to back, with knees bent and feet flat on the floor. They interlock their arms, and then try to stand up at the same time
- Make wood projects requiring sanding and hammering

- Play jumping games, such as hopscotch and jump rope
- Jump on a trampoline, large inner tube, couch cushions, bed, or other similar objects
- Bounce on a child-sized inflated ball with a handle
- Play games that involve heavy work, such as wheelbarrow walking, crab walking, tug-of-war or playing tag at the beach
- Climb on or hanging from monkey bars, a doorway chin-up bar, jungle gyms, a thick knotted rope, or old sheet with knots
- Carry or moving heavy objects (groceries from the car, laundry basket from room to room, a suitcase or pillow case full of toys, stacking books, moving furniture to help with vacuuming)
- Push/pull a wagon filled with heavy objects or other children
- Build towers with large, heavy blocks (e.g., taped up shoe boxes or other small boxes filled with sand, rice, pebbles)
- Use a Movin' Sit cushion or sitting on a large therapy or peanut ball during tabletop activities
- Wear a weighted vest or carrying a weighted backpack
- Wear ankle or wrist weights while doing activities, especially while learning a new skill, to provide extra feedback about body position
- Use a large lap beanbag during table top activities
- Provide frequent movement breaks during sedentary activities such as having the child carry books to the library, going to the gym or playground, or helping parent or teacher move heavy items
- Wrap stretchy elastic band around the legs of a chair for bouncing legs against or pushing feet against during sit down activities
- Stir cookie dough
- Dig in dirt

Decrease Sensitivity to Tactile Sensation

Generally pressure touch can be tolerated more readily than light touch. Always begin with pressure-touch activities and move to light-touch activities as child's tolerance increases. Allow the child to initiate activities, as often they will be tolerated better than therapist initiated touch. Start with body parts that are least sensitive (usually the back, trunk and legs), and then move to more sensitive areas (hands, feet, face and mouth).

- Have child and a friend sit with bare feet in big tub of sand placed under the table while engaging in a tabletop activity (board game, etc.)
- Hang onto trapeze and slides into shaving cream across the floor
- “Ice skate” on shaving cream with bare feet
- Play with dough or clay-type materials
- Make dough with varied resistance levels and consistencies
- Draw simple shapes, letters, or numbers with fingers in substances such as sand, clay, soap foam, pudding, etc.
- Draw on a mirror or on the side of a bathtub with soap foam or shaving cream
- Finger paint with paint, shaving cream, or pudding
- Identify shapes or letters drawn on back or hand
- Play hide and seek games with objects in dried beans or rice
- Play games where the child describes or identifies an object through touch alone
- Play with objects of different textures, to help with discrimination between soft and hard, rough and smooth, etc.
- Receive vigorous rubbing with a towel following bathing
- Use a variety of different textures during bathing or when wiping/cleaning face following meals (i.e., wash cloth, dish towel, cloth napkin, etc.)
- Play in different textures, barefoot if possible, (i.e., water, sand, beans or rice, grass, etc.)
- Engage in water play with different textured sponges, plastic scouring pads, wash clothes, etc.
- Rub skin with textured cloth, a soft brush, or lotion
- Participate in sports that provide a lot of tactile input, i.e., swimming
- Receive a firm massage
- Play with vibrating toys

Decrease Sensitivity to Vestibular Sensation

Generally, linear vestibular input is better tolerated than rotary input. Always pair vestibular stimuli with proprioceptive input for children who are hyper-responsive or over-reactive to vestibular input

- While prone in hammock swing with bean pool underneath, find hidden puzzle pieces or desired objects
- While prone or seated on a swing or therapy ball, child reaches for beanbags (therapist grades the distance and placement of beanbags) and child tosses them into a bucket
- Child is seated on a swing and beanbags are placed on the floor around the swing; child has to pick up the beanbags and toss them into a bucket while swinging
- While seated, kneeling, or standing on a rocker board, child plays balloon volleyball with another child or therapist
- While seated, kneeling or standing on a rocker board, child bats at a moving object (e.g., balloon tied to a string and suspended) with a dowel rod
- Walk across the room wearing moon shoes or stilts (or small plastic buckets upside down and attached to a rope)
- Visual balance board - child stands on board and moves marble around the track
- Play on swings that allow both linear (straight line) and orbital (circular) swinging. A playground swing or tire swing hung on a single chain or rope can provide a wider range of movement experiences
- Playground activities such as slides, merry-go-rounds, etc.
- Use toys that move or rotate
- Ride a big wheel, tricycle, or bicycle
- Play jumping or hopping games
- Roll across the floor or down a hill
- Sit in a rocking chair
- Swing in a hammock made of a blanket held by two adults
- Somersaults
- Rides at amusement parks

- Jump on a bouncy with handles
- Sit on peanut ball while watching TV
- Roll up child in blanket and then unroll quickly
- Sit on a blanket while being pulled around the room
- Ride on playground teeter-totter
- Take a gymnastics class
- Jump or diving into water
- Use a scooter board or skateboard. Child can lie on tummy or sit (wearing a helmet) and go down a gently sloped ramp or be pulled by a rope
- Engage in movement activities while in a variety of different positions, such as in sitting, in side lying, laying on back or stomach, etc.

Decrease Sensitivity to Auditory Stimuli

- Use headphones with soothing music
- Use metronome, set to 60 beats per minute, in the background
- Change tone quality or intensity of voice
- Use music that is enjoyable to the child
- Sing, hum, or whistle

Improving Sensory Discrimination and Sensory Perception

Increase Awareness and Discrimination of Tactile Sensation

- Hide objects in shaving cream and find the identified object; when finished, put the object in the “bath” and then return it to its proper spot
- Draw shapes on the child’s back and have him/her identify the shape
- Use tactile bins filled with rice, beans, corn, and water
- Place stickers on the child and have him or her find them
- With eyes closed, make letters or shapes on the chalkboard, with felt or sandpaper, and have guess the shape or letter

- Rub finger over paper with pixie sticks underneath and guess the number of bumps felt

Improve Vestibular System Functions

- For a small child, swing him or her in a sheet and then roll rapidly by each adult alternating raising & lowering his/her side of the sheet
- Spin in a laundry basket
- Sing songs during classroom break - reach and touch different body parts that are named in the song
- Jump off the loft onto a soft mattress (under adult supervision)
- Slide down sliding board
- Roll
- Swing
- Rock
- Play on scooter board
- Sit 'n spin
- Play dodge ball
- Jump on a pogo stick

Improve Oculomotor Control

- Use a flashlight to track on a racetrack; the child pretends the lights is the car and moves it through the racetrack
- Use lighted pens and toys
- Play catch with the Velcro® mitt and tennis ball
- Throw beanbags at target while on swing
- Blow bubbles
- Use a flashlight to find a picture on the wall
- Practice hitting a target such as a bat and ball

- Keep eyes on a stationary visual target while bouncing on ball
- Walk around a figure 8 drawn on the floor; at the same time, look at paper with various pictures hanging on a wall, and identify pictures, from left to right, while walking
- Bat at a moving target with a dowel rod while standing on a rocker board

Improving Postural Control and Motor Skills

Use sensory-based activities above prior to or during the following activities to support skill development

Facilitate Postural Control

- Play “Sinkball” – have child sit on the floor with legs straight out or folded if that is too hard; then throw a soft textured ball up into the sink
- Play blowing games, such as make a bubble mountain (fill a bucket 1/3 full with water and add bubble detergent; child uses large straw to blow into water and create “bubble monster”)
- Sit on a ball and keep feet in contact with ball
- Sit on a large ball (be sure feet are flat on the ground) and play catch or other activity
- Bounce on ball
- Roll across floor to retrieve objects, sequence objects, or complete parts of a task
- Prone in net swing for catching/throwing objects, or for puzzle
- Sit or kneel on bolster swing and catch/throw objects with one hand

Encourage Bilateral Coordination and Praxis

- Tear paper in small pieces for an art project
- Use scissors to cut paper, or non-paper materials such as dough or clay
- Use a rolling pin to roll out dough or clay
- Screw/unscrew jar lids
- Stir/mix in a bowl (i.e., making cookie dough, homemade dough, etc.)
- Using a plastic toy knife, cut materials such as dough, clay, cookies or a sandwich
- Build with construction toys

- Put together/pulling apart toys such as pop beads or stretch tubes
- Sting beads, cheerios/fruit loops, or macaroni
- Play with sewing/lacing cards
- Play games such as hitting a ball with a baseball bat, golf club, or hockey stick
- Catch a large ball, beach ball or balloon (encourage rotation of body)
- Play clapping type hand games
- Songs with finger movements that involve both hands, such as itsy bitsy spider and wheels on the bus
- Use palms of hands, roll dough into balls
- Close/open clothes fasteners (i.e., buttons, zippers, snaps, etc.)
- Pour liquid while stabilizing object receiving liquid
- Bat and ball games, hockey, golf
- Sweep the floor or patio
- Push and pull apart pop tubes
- Screw and unscrew nuts and bolts
- Piano or other musical instrument lessons requiring both hands

Increase Fine Motor Coordination/Dexterity

- Place coins in a piggy bank
- Use clothespins to pin up papers, clothes, etc.
- Pick up objects with various types of tongs or tweezers
- Use fingers to get objects out of a small area (i.e., coin out of coin purse, or coin out of a pocket)
- Play with small light toys that require fine manipulation to insert lights into patterns
- Pull off and placing small stickers
- Pegboard activities

- Hide and find objects (marbles, beads, buttons, etc.) in dough
- Make tiny balls of dough using thumb, index, and middle finger tips on
- Pretend to cut dough, using fingers as scissors and alternating fingers used
- Roll dough into snakes, using palm and fingers of hand
- Use clay to mold different shapes
- Open and close re-usable plastic bags or food containers
- Tear paper into little pieces for an art project
- Place and remove sticky-backed objects on felt board or strips
- Cup hands to roll dice
- Crumple paper in one hand
- Play card games
- Practice buttoning and unbuttoning from large to small size buttons
- Use an olive picker to retrieve small objects
- Use a hole puncher
- Play with lacing cards
- Take piano lessons
- Learn computer keyboarding
- Use scissors to cut out coupons, or pictures from magazines or catalogs
- Cut on firmer paper (i.e., note cards, file folders) to provide more stability
- Cut non-paper materials, such as dough, clay, silly putty, Styrofoam packaging pieces, straws, etc.
- Use squirt bottles or squirt guns/toys (to practice hand opening/closing movements similar to those needed when cutting with scissors)
- Provide variety during writing tasks by using different types of tools (i.e., chalkboard, clay tray, sand, finger painting, etc.)

- Color or use markers that change colors
- Write or draw in a clay tray, sand, or foam
- Make letters with dough snakes
- During writing activities, hold a cotton ball in palm, held down by ring and little finger
- Use small pieces of chalk, crayons or pencils when writing or drawing
- Make letters and numbers with Wikki sticks
- Use pencil grips to facilitate more functional writing grasp
- Use Handwriting Without Tears® program
- Draw or color on a vertical surface (i.e., on an easel, wall, classroom chalkboard)
- Modify activities for vertical surfaces (e.g. flannel board stories), and the following activities on an easel – sticker pictures, painting, ink stamping
- Using raised lined paper to provide feedback when learning to keep letters on the lines
- Use turkey basters, squirt bottles or eye droppers for squirt games

Fine Motor Materials that Provide Sensory Input

Resistive fine motor activities provide proprioceptive input. Several of these activities derived from pediatric occupational therapy listserv discussions. These ideas were compiled into the *Fine Motor List* by Deanna Iris Sava, MS, OTR/L.

- Pop beads
- Clothespins
- Scissors/markers/crayons
- Tongs
- Foam boards
- Chop sticks
- Nuts and bolts
- Paper clips

- Bubble wrap
- Puzzles
- Strawberry hullers
- Tweezers
- Eye droppers
- Squirt bottles
- Putty with pegs, beans, marbles or coins hidden in it
- Stack, sort or put coins or poker chips into a container
- Eyelet or other lacing boards
- Stickers
- Tops
- String beads
- Stamping activities
- Cat's cradle
- Small musical keyboard
- Commercial games such as: Lite Brite®, Operation®, Connect Four®, Jenga®
- Card games
- Dice games
- Origami
- Macramé
- Sand art
- Hook rugs
- Finger puppets
- Legos®

- Chinese balls
- Paper dolls
- Magna Doodle®
- Pick-up sticks
- Wikki Stix
- Dominos
- Lend some fine motor toys that are rich in sensation to teachers to put in centers for targeted children to use

Improving Praxis and Organization of behavior

Facilitate Ideational Praxis and Motor Planning

- Yoga or animal postures
- Put child's desired toy in a Ziploc® Easy Zipper, so the child must unzip it to get to the toy
- Hide the letters of the alphabet around the room and the child finds all the letters. Some are placed high, and the child must get the ball or ladder to climb on in order to reach them; if able, child can then write the letters out and match them each to the letters they found from around the room
- Playground activities
- Jumping jacks, mini trampoline, sitting or bouncing on a bouncy ball, pushing and pulling heavy objects
- Play Hokey Pokey, Simon Says, Twister, Bop It, Follow the Leader, Charades
- Clapping and rhythm pattern hand games
- Pretending to walk like various animals, or put your body in the shape of letters or numbers
- Build obstacle courses, which incorporate climbing over, under, through, etc.
- Activities that use whole body movements, such as pumping a swing, playing hopscotch, playing Simon Says
- Activities that require specific timing of body movements, such as kicking a rolled ball, playing balloon volleyball, using a jump rope, catching and throwing games, or hitting a ball with a bat

- Typical sports activities, simplified to meet the child’s skill level, for example with soccer, roll the ball to the child to kick it, have the child kick the ball to a specific target, slowly increasing the distance; with basketball, dribble the ball while standing still, or while walking, pass the ball from a very short distance and then gradually increase the distance, or shoot baskets from varying distances and angles and to different height baskets
- Projects which require assembling parts such as Legos,® or Tinker Toys®
- Play Hokey-Pokey, but instead of using body parts, use brightly colored shapes that children pick independently, and others playing follow their direction

Expand & Refine Spatial Perception

- Do jigsaw puzzles
- Set up small boxes as a town and use a cutout photo of the child to be placed behind, between, etc.
- Climb and crawl over, under, & around objects/equipment
- While on swing, drop beanbags into a bucket
- 3-D paper construction
- Craft projects
- Ring toss, horseshoes, badminton, ping pong, pool, croquet
- Create large maze and child has to find way “home”

Improve Timing & Sequencing

- Count (1...2... 3!!)
- Say “Ready, set, go!”
- Imitate clapping or slapping on large ball
- Child has to catch therapist in obstacle course
- Bat at a ball or a balloon
- Roll ball to child and have him/her kick it back
- Chant directions of obstacle course
- Use a metronome

- Play clapping, rhythm games
- Jump rope to songs
- Teach simple dances
- Child follows therapist's or another child's rhythm using musical instruments; child takes turn coming up with rhythm for others to follow
- Perform sequencing activities like paper airplane folding
- Child imitates sequence of actions of therapist or another child, and comes up with actions for others to follow (e.g., stomp feet two times and clap hands once)
- Therapist wiggles rope or moves it back and forth on floor and child has to jump over rope

Section 5: Activity Websites and References*

*Web site addresses listed here are subject to change.

Beadie Critters	http://www.beadiecritters.com/
Crayola Crayons	http://www.crayola.com/
Early Childhood Art	http://members.tripod.com/~Patricia_F/art.html
EGAD Group Ideas	www.egadideas.com
Kids' Games	http://www.kidsgames.org/
Making Friends	http://www.makingfriends.com
Origami	http://www.paperfolding.com/
Paper Airplanes	http://www.paperairplanes.co.uk/
Paper Dolls	http://www.allthingschristmas.com/web/kidzone/index.html
Printable Crafts	http://www.dltk-kids.com/
Ribbon Fish Directions	http://www.icandream.com/crafts/a/ribbon/fish/index.shtml
Rings & Things Jewelry	http://www.rings-things.com/404.html
The Idea Box	http://www.theideabox.com
The Science of Having Fun	http://www.funology.com
Treatment Ideas	http://www.childrensdisabilities.info/sensory_integration/activities-oral.html

All sites above were accessed on 8/19/03 and 4/22/2020.