Unit 4: Investigating Our World

Content Area: **Pre-School**
Course(s): **Pre-School**
Time Period: **Marking Period 3**
Length: **9 Weeks**
Status: **Published**

Unit Overview

This is a nine week unit designed to teach students about themselves and the world around them. The unit starts off with parts of the body, exercise, and the five senses. These lessons help students better understand their body and how it experiences the world. The unit moves into Martin Luther King Day/Kindness, Sun/Moon/Planets, Shadows/Ground Hog Day, Love, Simple Machines, and Dr. Seuss to teach about important people and science topics to help investigate their world. This unit includes the following social skills: dealing with losing (Skillstreaming), being honest (Skillstreaming), solving a problem (Skillstreaming), (SE08) group problem solving, (SE19) friendship and love cards, and asking to talk (Skillstreaming). The unit covers the colors yellow and pink and the shapes moon and heart. Students will learn letters X, K, P, G, V, M D and numbers 9, 10, 11, 12, 13. The concepts that we cover are opposites and rhyming words. The positional word that is taught is beside.

A one day exploration on President's Day may be included within this unit on the appropriate day.

Standards

4.1	Children begin to demonstrate an understanding of number and counting.
1.1	Children express themselves through and develop an appreciation of creative movement and dance.
9.1	Children demonstrate initiative, engagement, and persistence.
4.1.5	Use one to one correspondence to solve problems by matching sets (e.g., getting just enough straws to distribute for each juice container on the table) and comparing amounts (e.g., collecting the number of cubes needed to fill the spaces in a muffin tin with one cube each).
1.2	Children express themselves through and develop an appreciation of music.
9.3	Children identify and solve problems.
RL.PK.10	Actively participate in read aloud experiences using age appropriate literature in individual, small and large groups.
0.4	Children exhibit positive interactions with other children and adults.
4.3	Children begin to conceptualize measurable attributes of objects.
9.4	Children apply what they have learned to new situations.
5.4	Children observe and investigate the Earth.

1.3	Children express themselves through and develop an appreciation of dramatic play and storytelling.
4.4	Children develop spatial and geometric sense.
RI.PK.10	Actively participate in read aloud experiences using age appropriate information books individually and in small and large groups.
RF.PK.1	Begin to demonstrate understanding of basic features of print.
RF.PK.1.d	Recognize and name many upper and lower case letters of the alphabet.
RF.PK.2	Demonstrate understanding of spoken words and begin to understand syllables and sounds (phonemes).
RF.PK.3	Demonstrate an understanding of beginning phonics and word skills.
W.PK.1	Use a combination of drawings, dictation, scribble writing, letter-strings, or invented spelling to share a preference or opinion during play or other activities.
L.PK.2	Begin to understand the simple conventions of standard English grammar during reading and writing experiences throughout the day.

Essential Questions

1. What is on the inside of my body and how does my body work?
2. How do my senses help me to experience the world around me?
3. What do Presidents do?
4. Why is love important?
5. How does the sun, moon, and planets affect life here on earth?
6. How do simple machines help us every day?
7. How did important people like Martin Luther King Jr, the Presidents, and Dr. Seuss shape our world?

Application of Knowledge: Students will know that...

- Asking to talk is a good strategy when dealing with certain feelings.
- Figures 9, 10, 11, 12, and 13 are numbers and are each represent a specific quantity.
- Figures X, K, P, G, V, M, D are letters and are each associated with a specific sound.
- I experience the world through my senses.
- It is important to be kind to others.
- It is important to practice kindness and acceptance.
- It is important to tell the truth.
- Losing is part of a game and that you can keep trying.
- Loving people and things are positive experiences.
- President's are our country's leaders.
- Shadows are formed when an object blocks a light source.
- Simple machines help us with daily tasks.
- Solving a problem can help you by being independent.
- That each part of a book has a specific purpose.

- The sun and moon are part of the day and night.
- The sun is what provides us with light and supports life.
- The sun is what provides us with light.
- Their body as special parts inside that work together to allow the body to function.
- There are 8 planets in the solar system.
- There are different phases of the moon.

Application of Skills: Students will be able to...

- Count to numbers 9, 10, 11, 12, and 13.
- Demonstrate and practice kindness.
- Demonstrate and role play dealing with losing, being honest, solving a problem, and asking to talk.
- Explain how shadows are made.
- Explain the purpose of simple machines.
- Identify parts of the body.
- Identify the colors yellow and pink.
- Identify words that rhyme and do not rhyme.
- List people and things that they love and why.
- Match opposites.
- Name the planets and other celestial bodies.
- Recognize and name letters X, K, P, G, V, M, and D.
- Recognize and name numbers 9, 10, 11, 12, and 13.
- Recognize and name the shapes moon and heart.
- Recognize Martin Luther King Jr., George Washington, and Abraham Lincoln, and why they are important to us today.
- Use and respond to the positional word beside.
- Use strategies to solve a problem.
- Use their senses to describe the world around them.

Assessments

1. Quarterly Self Portrait
2. Quarterly Progress Report (IEP Direct)
3. Portfolio Assessment
4. Informal Teacher Observations (teacher generated)
5. Quarterly Assessment Test (teacher generated)
6. Report Card
7. Weekly and Daily Reports

Suggested Activities

Week 1-Parts of the Body/Exercise

- Practice recognizing letter X by completing find and dot, sensory writing, tracing, and activities using X words.
- Demonstrate how to write letter X and practice writing X on large Fundations white board. Use vocabulary sky line, plane line, grass line, and worm line when demonstrating.
- Circle and represent groups that show 9.
- Teach number 9 song to help students learn how to write the number 9.
- Introduce and roleplay social skill (Skillstreaming): Dealing with losing.
- Introduce the color yellow. Provide activities that use the color yellow.
- Introduce rhyme, "Head, Shoulders, Knees, and Toes."
- Have sticky notes ready with body part labels and pictures. Give students a clue before showing the label. (For example, what body part do I kick a ball with? My foot. A student will then stick the sticky note on teacher to show the correct body part.)
- Make a collage of favorite foods in our stomach.
- Feel their pulse, at rest and after exercise activities.
- Make the brain and have students color it in. Then paste the brain on a headband for the students to wear them.
- While wearing the brain headband, play "brain says." This was a modified version of "Simon says." Instead of saying Simon, we said "brain."
- Demonstrate what happens inside our lungs when we inhale and exhale by using a brown paper bag and a straw.

Week 2- 5 Senses

- Students will use the 5 senses to describe popcorn or other foods.
- Mix kool aide with water to create paint. Students can smell each paint and guess which scent they think it is.
- Use a mystery box to investigate the sense of touch. Introduce opposites like hard/soft and smooth/bumpy to help students describe what they feel.
- Match each sense with the correct body part.
- Sort items by each sense, (ice cream matches to taste, flower matches to smell, etc).
- Play what is missing game to investigate sense of sight.
- Introduce and roleplay Skillstreaming-Being honest.

Week 3- Martin Luther King Jr/Kindness

- Practice recognizing letter K by completing find and dot, sensory writing, tracing, and activities using K words.
- Demonstrate how to write letter K and practice writing K on large Fundations white board. Use vocabulary sky line, plane line, grass line, and worm line when demonstrating.
- Circle and represent groups that show 10.
- Write number 10 in various ways (rainbow writing, sensory writing, dry erase).
- Explain that Martin Luther King Jr.'s dream was that everyone would be treated equally no matter what the color of their skin was.
- Student's will observe an egg activity. The eggs will be two different colors (brown egg and white egg). Students will see that when they eggs crack, they look exactly the same inside.
- Students will learn a tune (bingo) that is called "Martin Luther King".
- Students will learn how important it is to be kind and draw a picture of how they can be a friend to

others.
- Students will draw a picture to show how to make the world a better place.
- Community Circle: Kindness shines through when we really listen to each other. Sit in a circle as a whole class. Only one person may speak at a time; the rest listen. Even though you facilitate, pose a question or topic for the students to speak about, it's important that the teacher be in the circle too—not as leader, but as a member.
- Temperature Check: Begin class by asking your students this simple question: "How are you feeling today?" This emotional check-in is an acknowledgment that we are all human and that we have feelings and emotions that sometimes change day to day. Students can turn and talk, or share with the whole class. As their teacher, this also alerts you to any fragile feelings or moods in the room to be mindful of, or to possibly meet with the students about privately after class.

Week 4- Sun, Moon, and Planets

- Practice recognizing letter P by completing find and dot, sensory writing, tracing, and activities using P words.
- Demonstrate how to write letter P and practice writing L on large Fundations white board. Use vocabulary sky line, plane line, grass line, and worm line when demonstrating.
- Introduce and roleplay (Skillstreaming) Solving a Problem and (SE08) Group Problem Solving.
- Introduce the shape moon. Discuss the attributes of the moon shape.
- Use a venn diagram to sort pictures by day, night or both.
- Read *Sun Up, Sun Down*. Use a globe, flashlight, and shiny sticker to demonstrate how the earth rotates around the sun.
- Read *The Moon Seems To Change*. Discuss the phases of the moon. Is the moon getting bigger or smaller on each page?
- Create a moon with flour and white paint. Use a water bottle to create craters.
- Read *Regards to The Man in The Moon* to explore other parts of space.
- Create a rocket ship using the letters in students' names.
- Read *Animals In The Sky* or other constellation book. Discuss what a constellation is.
- Create a constellation using black construction paper, white crayon, and star stickers.
- Create a sun by tearing yellow and orange construction paper and gluing on a circle template.

Week 5- Shadows/Light/Ground Hog Day

- Practice recognizing letter G by completing find and dot, sensory writing, tracing, and activities using G words.
- Demonstrate how to write letter G and practice writing G on large Fundations white board. Use vocabulary sky line, plane line, grass line, and worm line when demonstrating.
- Circle and represent groups that show 11.
- Write number 11 in various ways (rainbow writing, sensory writing, dry erase).
- Introduce the shape, heart.
- February is the month for hearts and groundhog. Students will learn all about groundhogs and what they look like. They will listen to one-step directions to create the face of a groundhog that looks like a heart.
- Student's will learn the origins of Groundhog Day.
- Teach the poem**:** *"Mr. Groundhog, Mr. Groundhog, Take a peak, take a peak, If you see your shadow, The weather will be awful, For six more weeks, for six more weeks!*
- Explain to students that everyone has a shadow. Your shadow is the same exact form of what you look like.
- Students will match different types of groundhog shadows to the right groundhog shadow.

- Students will use their fine motor skills and use buttons to complete a groundhog.

Week 6- Love

- List things that we love on an anchor chart.
- Read *Henry In Love*.
- Read *Love Monster and The Perfect Present.*
- Create Valentine's day gift for family.
- Use watercolor on heart shaped coffee filter. Place on cardstock to create a heart print. Give to a friend. Hang the dried filters as decoration for Valentine's day part.
- Introduce and roleplay Friendship and Lovecards (SE19).
- Practice recognizing letter V by completing find and dot, sensory writing, tracing, and activities using P words.
- Demonstrate how to write letter V and practice writing V on large Fundations white board. Use vocabulary sky line, plane line, grass line, and worm line when demonstrating.
- Complete heart activities including tracing and drawing.
- Introduce the color pink. Provide activities that use the color pink.

Week 7 and 8- Simple Machines

- Practice recognizing letter M by completing find and dot, sensory writing, tracing, and activities using M words.
- Demonstrate how to write letter M and practice writing M on large Fundations white board. Use vocabulary sky line, plane line, grass line, and worm line when demonstrating.
- Circle and represent groups that show 12.
- Write number 12 in various ways (rainbow writing, sensory writing, dry erase).
- Show children the simple machines from a feely box and invite children to describe the simple machine. Ask questions such as: "Where have you seen something like this?" "What do you think this is used for?" "What size is this?" "How could this help someone?" "Why do you think this simple machine words like that?"
- Explain that there are types of simple machines that can help you lift or move heavy things and make other types of work easier.
- Invite children to walk around each interest area and look for simple machines. Take photos of the simple machines and add them to the Art area.
- Introduce the work manual. Explain that manual means that "you make it work with your body, and it does not use batteries or electricity."
- Explain that the children will investigate each type of simple machine to "learn more about them" and answer their questions on the chart.
- Explain that an inclined plane is "a flat object that is higher on one end."
- Create their own playground using different types of simple machines.
- Introduce the word fulcrum. Explain that the fulcrum is the "point where the lever turns."
- Students will use a lemon squeezer to make lemonade. Explain the the lemon squeezer has a fulcrum at one end.
- Explain that screws, nuts and bolts, and nails are materials that are "used to hold things together," but they work in different ways.
- Provide students will paper and crayons, markers, or colored pencils and invite them to make an observational drawing of a screw.
- Explain that a pulley is "something used to lift things and is made with a rope and a wheel."
- Explain that a wedge is "a tool that has a point that is used to split something apart.
- Set up the cooking experience for making a Fruit Salad. Provide plastic knives or butter knives for the

children to use to cut the fruit. Talk with the children about how the blade of the knife is used to cut the food. Explain that the blade is the flat part of the knife that is used as a wedge.

Week 9- Dr. Seuss

- Create a "Cat in the Hat" hat with strips of construction paper.
- Match rhyming words.
- Read various Dr. Seuss books such as *The Cat In The Hat, The Foot Book, and One Fish, Two Fish, Red Fish, Blue Fish.*
- After reading *The Foot Book* match opposites.
- Invite parents to read on Read Across America day.

Activities to Differentiate Instruction

Differentiation for special education:

- General modifications may include:
    - Modifications & accommodations as listed in the student's IEP
    - Assign a peer to help keep student on task
    - Modified or reduced assignments
    - Reduce length of assignment for different mode of delivery
    - Increase one-to-one time
    - Working contract between you and student at risk
    - Prioritize tasks
    - Think in concrete terms and provide hands-on-tasks
    - Position student near helping peer or have quick access to teacher
    - Anticipate where needs will be
    - Break tests down in smaller increments
- Content specific modifications may include:
    - Create larger templates for writing activities.
    - Include pictures with words.
    - Highlight dotted lines for writing and cutting activities.
    - Include dots to indicate starting points when writing.
    - Verbally and physically prompt students to ensure that they are able to follow daily routines successfully.
    - Students with expressive language challenges may join in gradually and will have proximal seating to afford optimal visual and auditory cues for songs, stories, and finger plays.

Differentiation for ELL's:

- General modifications may include:
    - Strategy groups
    - Teacher conferences
    - Graphic organizers
    - Modification plan
    - Collaboration with ELL Teacher
- Content specific vocabulary important for ELL students to understand include:

- Head, Shoulders, Knees, Toes, Eyes, Ears, Mouth, Nose, Lips...other body parts relevant to the days lesson., See, Hear, Smell, Taste, Touch, Senses, Kind, Martin Luther King Jr., Sun, Moon, Planet, Shadow, Light, Ground
  Hog, Love, Friendship, Machine, Lever, Inclined Plane, Screws, Dr. Seuss

Differentiation to extend learning for gifted students may include:

- Focus on letter sounds.
- Spell three letter CVC words.
- Independent writing activities.
- Leading the group.
- Basic addition and subtraction with manipulatives.

Integrated/Cross-Disciplinary Instruction

The Investigating Our World unit is a cross curricular unit with a focus on science topics specific to bodies and the natural world. Across the school day, students are immersed in activities that explore math, language arts, social studies, and science concepts. As they engage in various centers such art, library, dramatic play, building, and science their play combines elements of all content areas. While students are engaging in centers, the teacher and instructional aide looks for opportunities to teach into and enhance student understanding of content.Students will learn literacy, mathematics, science, and social studies skills when studying topics parts of the body/exercise, 5 senses, Martin Luther King Jr/Kindness, Sun, Moon, and Planets, Shadows and Lights, Love, Simple Machines, and Dr. Seuss.

Resources

Books: Parts, Look Inside Your Body, My and My Amazing Body, My Body, Inside Your Outside, My Hands, My Five Senses, Sniff Sniff, The Five Senses, I Have A Dream, Kindness Counts, Acts of Kindness, Kindness is Cooler, The Solar System, Hello Sun, On The Moon, Faces of the Moon, Wake Up Groundhog, The Grouchy Groundhog, Groundhog's Dayoff, Grumpy Groundhog, The Day it Rained Hearts, Love Monster, The Biggest Valentine Ever, Henry In Love, The Perfect Present, My Neighbors and Their Simple Machines, A Farmer's Life For Me, Owen, Featherless, The Cat in the Hat, The Foot Book, One Fish Two Fish Red Fish Blue Fish, Hop on Pop, The Lorax, Green Eggs and Ham

Songs and Rhymes: Abby Had An Anteater, Ticky Ricky, Dinky Doo, Two Plump Armadillos, This Old Man, Riddle Dee Dee,

Other Resources: Creative Curriculum for Preschool Teaching Guide, Creative Curriculum for Preschool Mighty Minutes cards, Creative Curriculum for Preschool Intentional Teaching Cards, Creative Curriculum for Preschool: Tree Study, Skillstreaming in Early Childhood, Third Edition by E. McGinnis (social skills).