

Classifying Animals

A Two-Week Thematic Unit/Integrates Learning for Second Grade

TN Science Standard:

2.LS1.2

TN Math Standards:

2.MD.D.10

2.MD.A.2

By: Courtney Fitzstevens

ECED 4450-201



Integrated Learning Segment: Life Science

Two-Week Thematic Unit for Preschool

By: Courtney Fitzstevens

Focal Science Standard(s): TN State Standards – Life Science (From Molecules to Organisms: Structures and Process) 2.LS1 2). Obtain and communicate information to classify animals (vertebrates- mammals, birds, amphibians, reptiles, fish, invertebrates-insects) based on their physical characteristics.

Theme/Topic: Life Science

Table of Contents

Contents

Introduction and Rationale (a)	4
Standard/s Addressed, Goals, and Objectives for the Unit (b)	6
A Curriculum Web (c)	8
Title and Description of Learning Experiences (d).....	9
Overview.....	9
Calendar	10
Titles and Descriptions	14
Two Complete Lesson Plans (e)	25
Complete Lesson Plan #1:	25
Complete Lesson Plan #2:	31
Unit Evaluation Plan (f)	37
Formative	37
Summative	37
A Letter to Families (g).....	38
List of References (h).....	39
Teachers	39
Families.....	39
Children	39
List of Resources Used in the Unit (i).....	41
Materials and supplies.....	41
Print and non-print	42
Technology resources	42
Other	44

Introduction and Rationale (a)

This integrated learning is on Life Science and it is planned for two weeks. By having it take place over two weeks, teachers can see if students comprehend the physical characteristics of animals and it allows students extra time to grasp the concept. The main goal of the unit is for students to be able to obtain information on animals' physical characteristics and communicate it, correctly. The teacher will be implementing hands-on activities, group work, projects, and experiments that promote inquiry and are engaging. Having all of these activities, it guarantees that students are getting the most out of their learning. Each activity that will take place allows for modification, along with accommodation. There are ample amount of opportunities for all students to get involved. There are accommodations for students who need more support or have an IEP, which allows these students to have a fair chance in participating. This thematic unit is appropriate for 2nd graders because it is focused on the second grade standard. All of the lessons and activities are developmentally appropriate because it leaves child out and it is appropriate for their grade level and developmental level.

The two week unit will focus on classifying animals, specifically by obtain and communicate information they find. The standard that goes with this standard is “2.LS1 2) Obtain and communicate information to classify animals (vertebrates-mammals, birds, amphibians, reptiles, fish, invertebrates-insects) based on their physical characteristics.” (TN State Board of Education, 2018) Learners will get an understanding on how animals are similar and different and how they relate to one another. All the activities will have inquiry: open, guided, and structured. By having three different types of inquiry meets everyone's learning levels. By having structured inquiry, students are provided with a question. Guided inquiry students are given a question, but they set everything up for their investigation and test it. Open

inquiry students come up with their own questions and methods and then they carry out the inquiry, all on their own (Worth, K., & Grollman, S, 2003).

Over the next two weeks we will also focus on the 5 E's to ensure that students are getting a deep understanding of science. Students will engage in hands-on activities and activities that provide a better understanding of our standard. For instance, students will look at animals and classify it. Students come up with how they want to classify it, which leads to promotes inquiry. Students get to explore materials when they are creating animals with playdoh and writing their stories. Students will also explore materials when they are design animals spines. They get to observe worms in their natural habitats and explain what they observed with their peers in small groups. Students will elaborate on their thinking and classification of animals. Students will also evaluate what they have learned throughout the two weeks by think-alouds and open discussion in small and whole group (An elaboration of the PrimaryConnections 5Es teaching and learning model, 2008).

Standard/s Addressed, Goals, and Objectives for the Unit (b)

Standards addressed. The primary focal standard is for second graders and it comes from the Tennessee Academic Standards for Science. This standard falls under the Life Science section which requires children to “model ecosystems and make connections between populations of organisms”. This standard is also important because by the end of second grade, students have to know animal classification, life cycles, and how they change to their environment to survive. The science standard is 2.LS.1: 2) Obtain and communicate information to classify animals (vertebrates-mammals, birds, amphibians, reptiles, fish, invertebrates-insects) based on their physical characteristics. The math standards are: 2.MD.D.10 Draw a pictograph and a bar graph (with intervals of one) to represent a data set with up to four categories. Solve addition and subtraction problems related to the data in a graph. 2. MD.A.2 Measure the length of an object using two different units of measure and describe how the two measurements relate to the size of the unit chosen. The literacy standard that goes with this is: 2.FL.F.5 Read with sufficient accuracy and fluency to support comprehension. a. Read grade-level text with purpose and understanding.

Goals:

Students will be able to communicate why animals are in groups and their importance.

Students will be able to communicate what the six animal classifications are.

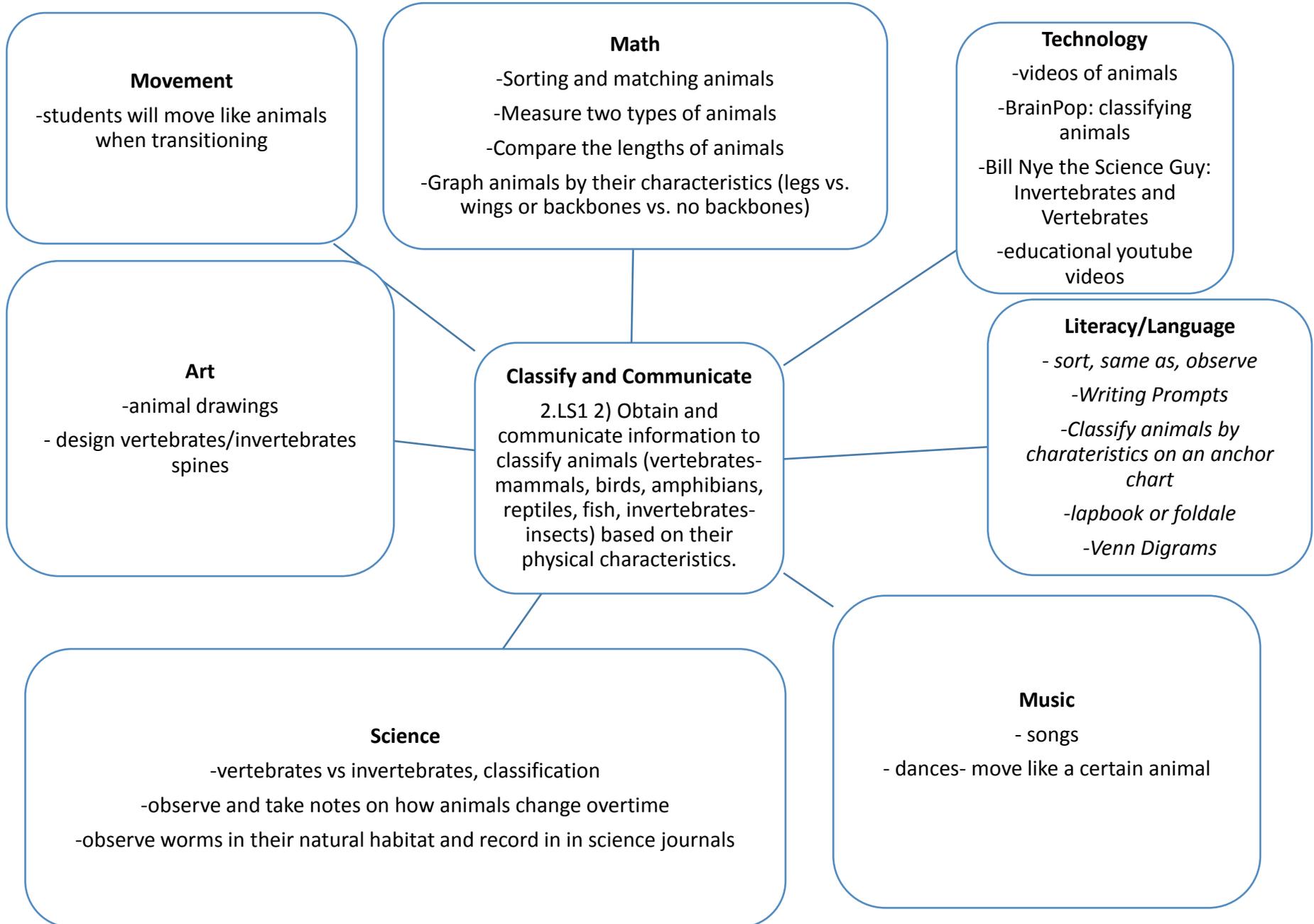
Students will determine why the physical characteristics are important to animals.

Objectives:

1. The goal of this unit is for children to learn key vocabulary (e.g., survival, adaptation, life cycles, and classification) and to be able to describe and categorize animals (vertebrates and invertebrates).

2. Students will graph animals by their characteristics (legs, wings, backbones, no backbones) and discuss the data they have collected with 85% accuracy.
3. Students will get along and work together with their peers without conflicts.
4. Students will classify the physical characteristics among the six major animal groups with 90% accuracy.
5. Student will gain an understanding of reptiles and amphibians from videos and class discussions.
6. Students will produce well written stories on vertebrates and invertebrates.
7. Students will complete equal amount of work in group projects.
8. Students will accurately compare and contrast animals' characteristics with 90% accuracy.
9. Students will measure the length of animals with two different units of measurement with 95% accuracy.

A Curriculum Web (c)



Title and Description of Learning Experiences (d)

Overview

Below I describe the learning experiences that will take place over the next 10 days of the unit. I open with a book or video every day to get students engaged and interested. Then I engage students in the big idea by doing small groups that allows students to work with their peers or teacher about our topic. Then students get engaged in the whole group by having a KWL chart that they fill out together as a whole. Throughout the unit, I will assess students' knowledge based on what they are learning. Students will get engaged in experiments about the different types of eyes animals have and the benefits of backbones.

Throughout the ten days students will have numerous amounts of opportunities to explore materials and create things, like animals and a zoo. Students will explain their thinking when they compare and contrast amphibians and reptiles. Students have time to elaborate and use what they already know to their work each and every day. Throughout the two weeks students will review and reflect on what they are learning. Students will have time to evaluate their new knowledge to their previous knowledge and see how it has adapted because they have gained new information. Students will be evaluated throughout the two weeks and activities will be modified accordingly.

Calendar

Schedule	Monday	Tuesday	Wednesday	Thursday	Friday
Arrival/Whole Group	Read: What if You Had Animal Hair!? Introduce the topic for the next two weeks.	Watch: Classifying Animals (Brain Pop J.)	Read: Zack's Alligator	Read: What if You Had Animal Feet!?	Read: What if You Had Animal Teeth!?
Small	Students write about what they want to learn about over the next two weeks	Classify vertebrate groups on their hands (drawing) (birds, mammals, fish, reptiles, and amphibians)	Write a rough draft of a story about vertebrates	Write a rough draft of a story about invertebrates	Cold Blooded vs Warm Animals Activity
Welcome/Whole Group (60 Minutes)	Do a KWL chart with students about animals, classify in groups, and discuss (See Lesson Plan 1)	Read: Incredible Invertebrates Graph animals by a certain classification	Discuss Reptiles and Amphibians Watch videos of both on Brain Pop Fill out a Venn Diagram with the two animals	Sort invertebrates and vertebrates on the Smart Board Students build invertebrates and vertebrates with playdoh then stack small blocks	Create a safari jacket flipbook on animal classifications
Transition	Walk like a reptile	Fly like a bird	Walk like an amphibian	Name an animal with a backbone	Name a type of invertebrate or something interesting about them
Snack		Make a spine (life savers mints and gummies, and pipe cleaners)			
Center Time	Play with vertebrate dominos	Play animal memory	Math Stations: Measurement	Build animals with hands on materials (Playdoh, pipe cleaners, popsicle sticks, etc.)	Students get to choose any center activity that we have done this week
Outdoor Learning/Gross Motor					
Small Group	Review what they learned today and how they classified animals	Read leveled books about animals	Work on stories	Work on stories and share with a partner	Finish flipbook

Free Play/Outside Departure					
--	--	--	--	--	--

Week 1 of 2

Week 2 of 2

Schedule	Monday	Tuesday	Wednesday	Thursday	Friday
Arrival/Welcome	Read: Let's Classify Animals Talk about Designing a Zoo project	Watch Bill Nye the Science Guy: Invertebrates	Read: Actual Size	Read: Diary of a Worm	Read: The Animal Kingdom
Small Group	Review Vertebrates and Invertebrates	Talk with students about their zoo projects while they work.	Students will work and finalize projects	"If you were a worm, what would you do?" writing activity	Students will perform their song or dance to their peers (whole group, today)
Whole Group (60 min.)	Review of what we have been learning Students will work on their Design a Zoo project	Read: Eye to Eye: How Animals See the World The Eyes Have it Activity	Groups will present their zoos. Discuss students next project expectations (drawing, classification, 3 facts, and one thing the learned that is important) and let them pick animals	Students present their projects and sort what category student's animals fall under and graph them Watch educational videos on worms	Classifying the Room (See lesson plan 2)
Transition		Name a mammal	Walk like a warm blooded animal	Walk like a cold blooded animal	Name a fish or animal from the ocean
Snack		Animal Crackers		Make edible worms	Eat Edible Worms
Center Time	Animal Hula Hoops	Build an animal out of playdough for each animal classification	Students will refer to <i>Actual Size</i> book and measure things around the room that are the same length as things in the book	Read animals books based on individual reading levels	Pick any activity from the this or last week
Outdoor Learning/Gross Motor				Observe worms in their natural habitat	
Small Group	The teacher will work with groups and give feedback on their projects	work on their design a zoo project	Students will edit and finish projects	Students (in groups) come up with a song or dance to help remember the differences between	Students will fill out the L part of the KWL

				invertebrates and vertebrates	
Free Play/Center/ Departure					

** Complete lesson plan*

Titles and Descriptions

Week 1

Day 1

The first activity of the day is a fiction text, *What If You Had Animal Hair*, in which the teacher will read to get students interested and engaged. Then the teacher will ask his/her students why they think they read that story and then s/he will introduce the theme for the week. This happens first because it gets students engaged. Then in small groups students will write about what they want to learn about over the next two weeks. This will be looked at different than a pre-assessment because it allows teachers to see what they are interested in and not at what they already know. Then the class will have a discussion about animals and their classifications. The teacher will fill out a KWL chart as students list what they know and want to know. This will allow students to explore their ideas and explain their ideas if it does not make sense completely or if their peers are confused. Then the teacher will start with lesson one.

The teacher will pull out plastic animals out of a closed box and ask students what group it belongs to, invertebrates or vertebrates. Then students will work in groups to classify animals into groups of their choosing. This will allow students to engage in their learning and elaborate with their peers about their thinking process. This also promotes inquiry because the teacher does not tell them how to categorize. Then when every group is done, each group will present their classification categories. Then the class will find the similarities and differences among each groups' categories through open discussions which allows for students to elaborate and extend their explanations.

Throughout the day students get to walk like a reptile to their table or other areas, when they are transitioning. For free play students can play with vertebrate dominos. This lets them

engage and pair matches together. This also allows for students to work with their peers more. By having students work with their peers during the lesson and at dominos during free play, they are enhancing their social development. For the second small group, students will review what they have learned today and what they took away. This allows them to explain their thinking and learning with their peers; it also allows students to work on their listening skills.

Day 2

Day two also starts with a video about classifying animals. This will allow students to hear and see how scientists classify animals. The teacher will pause the video two minutes to see if students are paying attention and to discuss information. For instance, the teacher will pause and ask about vertebrates and invertebrates, and then s/he will pause and ask about birds and fish, and so on. This allows teachers to evaluate students' knowledge. In small group students will take what they learned from the video and discuss it more in depth. Then they will trace their hand and label each finger with one of the five animal classifications, they will not list mammals . This will help students remember the classifications and it allows them to have a visual.

During whole group the teacher will read a book because it grabs learners' attention and gets them to focus on what is to come. The book is a nonfiction text, *Incredible Invertebrates*. It is important to also read nonfiction texts to students because it helps them develop background knowledge on certain concept. Then the class will do a math activity together. Everyone will grab their clipboards and pencils. Then the class will graph animals based on their classifications. Teachers will ask students to name animals that belong to each category. For instance, for birds students would name flamingos, penguins, owl, etc. The class can decide if they want to write the names of the animals in each section or they can color a box for each animal name. The

transition for this day is fly like a bird. Teachers need to model this one and make sure to remind students to not hit each other and to make sure they are staying in their personal bubble. This allows students to have a fun and active transition instead of the normal walking.

For snack students will make a spine out of life savers and pipe cleaners or twizzlers. This allows students to engage and create something they can relate to because they have a spine. For center time student will play animal memory with their partner or group. This allows students to practice their memorization skills and social interactions. Once they find all of the matches, students will discuss what animals are invertebrates and which ones are vertebrates. For the last small group of the day, each group will read a book for their reading level. These way students are still working on fluency and improving their reading. This also allows for students to have an open discussion about what they have read and how it relates to what they have been learning.

Day 3

Day three starts with a funny fiction book, Zach's Alligator. I choose this book for day three because the topic for today is reptiles and amphibians. In small group I am having students write a rough draft about vertebrates. This will work as a review for students and it allows them to explain what they have learned and elaborate on it. Then in whole group teachers will have an open discussion on amphibians and reptiles. This will allow students to talk to their peers about what they already know. It also allows teacher to see what they know and if something is not true that the students say then the teacher can explain why it is not true. This will help students adapt their prior knowledge of things. During the discussion the teacher or the teacher helper will be writing things down on the board. This way the class can refer to it throughout the day and it helps students see what has already been said.

Then the teacher will show a four minute video on the subject. Teachers should do this after that way students can tell what they already know first. Then after the video, students will do a think pair share about what they learned from the video. Then students will go back to their seats and work on a Venn Diagram. The transition for today is walk like an amphibian. This will allow students to act like what they are studying for the day. For center time, students will measure the length of amphibians and reptiles with two different units. Then they will compare. It goes along with the math standard: 2.MD.A.2 Measure the length of an object using two different units of measure and describe how the two measurements relate to the size of the unit chosen. For the second small group, students will work on and finish their vertebrate stories. If they finish early they can draw a picture that goes along with their story.

Day 4

Today starts with a fiction book that students love, What if You Had Animal Feet? After the teacher reads the story, students will discuss what they would do if they had animal feet. This gets students engaged and makes them laugh. In small group, students will work on stories about invertebrates. It is the same as yesterday. It will work as a review for students and it allows them to explain what they have learned and elaborate on it. Then the teacher will pull up a document on the smartboard that has several animals on. The teacher will call on students, one by one, to come and put an animal in the right column: vertebrate or invertebrate. The teacher will ask students why they put in whatever column they choose and s/he will ask the class if the student is right or not. If they are not right, the class has to help the student explain what column it goes under and why. This allows students to be engaged in their learning, explain their thinking, and encourage their peers.

After the sorting is done, students will go back to their seats and look at the materials on their desks. There will be playdoh and a small stack of jenga blocks. The teacher will ask students what they think they will be doing. Then the teacher will ask students to build two animals and see which one can support the most weight. The teacher will walk around the room asking students which animal held the most and why. As the activity goes on, the teacher will ask everyone what two types of animals they are building and what is the main feature that one has that the other one does not. This allows students to get engaged and it also allows for structured inquiry.

The transition for today is to name an animal with a backbone. The key to this is to make sure no one repeats themselves. This way students are listening to each other and actively thinking. For the second small group, students will finish their stories and share it with a partner. This has students working on their social skills and listening skills for feedback if any is given. It also allows for elaboration if something is confusing or unclear to the reader.

Day 5

Day five starts with another What if book. This one is called What if You Had Animal Teeth? After the teacher read the story, students will do a think pair share with their knee partner about what they would do. Then for whole group students will be putting what they have been learning all week to the test, so to speak. Students will be creating a safari jacket flipbook. The teacher will and some students will pass out all of the required materials and then the teacher will explain what they are going to do. Students will start with the front of the vest filling out facts about the six animal classifications we have been studying. Students will write down two to three facts and a picture for each. The pictures should resemble nonfiction texts.

Then students will pick one animal they are really interested in and write about it. Students will write three paragraphs about their animals. Once the writing is done students will then they will draw pictures of animals in their natural habitat or camouflaged into the wild. This activity allows students to engage in their learning, explain their thinking about each animal by listing facts, explore animals in their habitats or camouflaged by coloring them, elaborate on their favorite animal, and review/evaluate their work. It goes along with all the five E's of the learning model. It also goes along with the literacy standard: 2.FL.SC.6 Demonstrate command of the conventions of standard English grammar and usage when speaking and conventions of standard English grammar and usage, including capitalization and punctuation, when writing.

If students do not get done that is okay because they will be working on them later. The transition for today is to name a type of invertebrate or something interesting about them. This forces students to stop and recall what they have learned. Again like yesterday, students cannot repeat each other. For center time, students can pick any activity that they have done this week for centers and do it again. For the second small group, students will work on and finish their safari jacket flipbook. Once students are completely done, teachers will display them inside the room or in the hallway.

Week 2

Day 6

Day six starts with nonfiction book, Let's Classify Animals. After the teacher reads the book, s/he will ask students what they learned that they did not know before. After the discussion, the teacher will tell students about a project they will be working on for the next two days. In small groups, students will review in what they have learned about vertebrates and invertebrates. Then in whole group, the teacher will have each group discuss what they talked about in their small groups. Then the teacher candidate will explain what students will be doing for their

project. Students are expected to research zoos to help them build their background knowledge of the layouts. Then they will determine the best location for animals within their layout.

Then they will decide which animals best represent their animal classifications. They should have at least three animals per category. Students will be allowed to use whatever materials they want from the materials the teacher provides: Construction paper, poster board, card board, crayons, pipe cleaners, markers, etc. Students will write a paragraph description for each animal group. Students will also need to name their zoo, identify where it is located, the physical characteristics of each animal in the zoo, and tell how they classified the animals in their zoo. The purpose of this activity to engage students in group work that requires everyone to have an equal share of work and be respectful of each other's ideas. It also has students evaluate their individual learning because they must be knowledgeable about what they are putting in their zoo.

This activity also requires students to use technology. So the teacher must ensure that students share and give equal amount of time to everyone. Groups will not finish it during this time but they will have time to work on it later. During center time, students will classify plastic animals into groups of their choosing. Students will use plastic animals and hula hoops. By having students use these materials it allows them to use hands on materials and spread out. For small group, students will work on their zoo projects again. The teacher will give each group feedback as s/he walks around the room assisting groups.

Day 7

Day seven students will watch Bill Nye the Science Guy: Invertebrates and students will take notes on what they think is interesting. By having students take notes during the video, it holds them accountable and it engages them. It also allows students to evaluate their learning because if they already know that a squid is an invertebrate, they can write down something they

did not know about squids. Once the video students will look over their notes and tell the group two things they found interesting. In small group, students will work with their groups on their zoo projects and the teacher will talk with students to see how things are going and helping if needed.

In whole group, the teacher will show pictures of tigers, frogs, and butterflies. Then s/he will ask the class what they notice about these animals' eyes. Then the teacher will read, *Eye to Eye: How Animals See the World*. The teacher will stop after reading the first four pages and ask students what they notice about the four different types of eyes. Then they will finish the story. This engages students because they are observing and explaining what they see. Then the teacher will introduce the activity that student will be doing and remind them to be extremely careful when they place thing near their eyes. The teacher will pass out materials that will represent animal eyes to each group. Students will use materials to look at something in the distance. Then they will sketch what they see/saw. Students will look through three different models: Eyespot, Pinhole, and Compound. For the eyespot students will put on a face mask over one eye. It is made out of wax paper and poster board. For pinhole eyes, student will look through a toilet paper tube and close their other eye. During this one student will look at three different objects, all different sizes, and sketch each object. For the last model, compound eye, students use one eye to look through twelve straws bound together with a rubber band. By having students looking through the three different eye types, teachers are having them explore. Once everyone has looked through the models and sketched what they have seen, students will come back to the carpet and discuss about the different eye types and how they help animals survive. Lastly, students will compare what they saw through the model to their own eyes, camera lenses as the

book calls them. Teachers will pass out a piece of paper that students will put their sketches on. This activity came from Science and Children, 2017.

The transition for this day is name a mammal. Students will name a mammal but they cannot repeat anything their peers have said. The teacher will provide animal crackers for snack today, since that has been the theme for the two weeks. For center time, students will create six animals, one from each classification, out of playdough. This allows students to engage in hands on materials. For the second small group activity, students will work on their zoo projects.

Day 8

The teacher will read Actual Size, a fiction text. After the story is read, teachers will ask students what they think the size of things in the book. Then in small group, students will put the finishing touches on their projects. In whole group each group will present their zoos to the class. Once everyone has presented and questions have been answered, the teacher will tell students about their next project that they will start today. For this project, students will pick an animal they really like and research it. Students will draw the animal, classify it, write three facts, and one thing they learned that is important. Students can use the computers and iPads, if the teacher has them, to do their research.

They can also read the books that are in the class library and the ones the class has read together. The transition for this day is walk like a warm blooded animal. Teachers can have students walk like any warm blooded animal except for a human. This will add more of a challenge to students. For center time, students will measure things around the room and compare them to things from the book. During small group, students will edit and finish their animal projects.

Day 9

This is the busiest day of the whole two weeks. The teacher will start with reading a fiction book, *Diary of a Worm*. This will get students engaged because it tells life of a worm, in the worm's point of view. The teacher will ask open ended questions throughout the read aloud to get students reflect on what they have heard. Students will discuss what they would do if they were a worm. In small group students will write in their reading journals, "If you were a worm, what would you do?" It is done in small groups because the teacher can give more one on one support to students who need it. This activity gets students to explore their ideas and explain their reasons for what they would do.

For whole group, students will present their projects from yesterday. Once everyone has finished presenting, the teacher will have students sort each other's presentations into classifications. Then they will graph the groups and discuss what they see and what they found out by sorting and graphing them. After this is all done, students will watch an educational video on worms. Then they will discuss what they watched and how it relates to what they already know. For the transition, throughout the day, students will walk like a cold blooded animal. This will make students stop and think about what they have learned. For snack students will be making edible worms. The worms will not be ready to eat so they can eat already made gummy worms and then tomorrow they can eat their worms. For centers, students will read animal books that are on their grade levels and then they will discuss what they have read. This allows students to engage with their peers about what they read and explain what stuck out to them.

For the outdoor learning students will observe worms in their natural habitat. Students will record what they are observing in their science journals. This allows students to be held accountable for their work and it allows them to have evidence that they can refer to when needed. For the last small group of the day, students will work in their small groups to come up

with a song or dance. The song or dance is meant to help them remember the differences between invertebrates and vertebrates and what they have learned this week. This gets students engage in their learning and with their peers; it also allows for students to explore their learning styles.

Day 10

Day ten starts with a nonfiction text, *The Animal Kingdom*. I choose a nonfiction book because for the last two days they have been reading fiction and it is important for students to get a variety of both types of texts. The small group today is actually a whole group that lasts thirty minutes. The first fifteen minutes students will work on the song or dance. Then each group will perform. Then the class will have an open discussion about what they liked from each group's performance and what they will take away from it. This has students elaborate on what will help them remember more. For whole group activity students will classifying the room. There will be parent volunteers with live animals or there will be videos of animals in their natural habitats. Students will be numbered off in groups.

Then they will go to the station that matches their number. See Lesson Plan 2 for more information. Once everyone has visited every station, the teacher will call everyone back to the carpet and they will discuss. This activity allows students to get engaged in their learning and explain what they are observing. The transition for today is to name a type of fish or animals in the ocean. It is okay of students repeat an answer, but they cannot repeat it more than two times. The snack for today will be the worms that they made yesterday. For centers, students can pick any activity from this or last week. For the second small group, students will get in their groups and talk about what they learned over the last two weeks. Then they will fill it in on the KWL Chart on the chart paper. This allows students to evaluate their learning.

Two Complete Lesson Plans (e)

Complete Lesson Plan #1:

Lesson Title: Intro to Classifying Animals

Grade/Level: 2nd

Date/Learning Experience #:

Curriculum Standards	Essential Question
<p><i>State Curriculum Standards – Underline your language/vocabulary words</i></p> <p>2.LS1 2). Obtain and <u>communicate</u> information to <u>classify</u> animals (vertebrates- mammals, birds, amphibians, reptiles, fish, invertebrates-insects) based on their <u>physical</u> characteristics.</p>	<p><i>What question(s) or big idea(s) drive your instruction?</i></p> <p>How do we sort animals into groups?</p>
<p>Lesson Objective(s) – Student Learning Outcome(s) for this learning experience</p> <p><i>Objectives use active verbs, are measureable (if applicable), and link to standards. Consider using Bloom’s Taxonomy or Webb’s Depth of Knowledge.</i></p> <p>The learners will classify animals into groups with 80% accuracy.</p>	
<p>Knowing Your Learners</p> <p><i>Describe pre-requisite skills students already know that will help them meet the lesson objective(s). What is your evidence that students need this/these skills(s)? This may include pre-assessment data; student personal, cultural or community assets you have gathered and observations you have made concerning your students.</i></p> <p>The learners already know about hibernation and migration. The learners know that reptiles are cold blooded, and mammals are warm blooded and have hair. They know that humans are also mammals and platypuses are the only mammals that lay eggs. The learners know this because they have done lessons, activities, and assessments with Ms. Kelli.</p>	
<p>Assessment/Evaluation</p> <p><i>How will students demonstrate understanding of lesson objective(s)?</i></p> <p>Informal: <i>How will you monitor student progress towards lesson objectives as you are teaching? (formative assessment)</i></p> <p>The teacher candidate will have students think pair share during whole group time on the carpet. The teacher candidate will observe as s/he walks around the room during small group work.</p> <p>Formal: <i>What evidence (formative and/or summative) will you collect and how will you document student learning/mastery of lesson objective(s)? A summative assessment is not needed for every lesson, however, it is required for every lesson submitted for CAEP data collection point (e.g., 3000 courses – ECED 3210, READ 3100, SPED 3300, PEXS xxx; 4000 courses – ECED 4680, CUIAI 4241, SPED 4710, PEXS xxx, ECED 4780, CUIAI 4391, SPED 4850, PEXS xxx).</i></p> <p>The teacher will collect students anchor charts and assess the categories students’ label.</p> <p>Academic Feedback: <i>How will you give academic feedback? How will your academic feedback promote student understanding of the learning objective(s) or state standard(s)?</i></p> <p>What made you put the tiger with the reptiles? Are these two categories the same or different? Can you explain your reasoning to me?</p>	
<p>Assessment Modifications</p> <p><i>What modifications will you make on assessments/evaluations for students with diverse and/or special needs (i.e. students with IEP or 504, struggling learners, advanced learners) and will these modifications be within/for small groups or individuals?</i></p> <p>For students with an IEP, the teacher candidate will already have defined groups and have students place their animals in the correct group.</p> <p>For advanced learners, students will write animals (that they do not have) on index cards adding them to their</p>	

	categories.
<p>Assessment Theory/Rationale: <i>I am administering/giving/collecting _____ because my students need _____. This is appropriate because _____. Provide citation (APA, 6th edition) for learning theory and/or research.</i></p> <p>I am collecting my students work because my students need to know how to add in order to be successful in life. Children have to be able to understand addition before they can subtract, learn money, multiplication, division, etc. Closely evaluating my students’ work samples will inform me of specific areas I can offer more assistance with. Observations are a good informal assessment because the teacher candidate can see how well or how bad a student is doing on a certain problem and help them right then and there. It also allows teacher candidates to see if students are grasping the concept of adding two-digit numbers to one digit number or not. (Van de Walle, 2018)</p>	
<p>Academic Language Demands</p>	
<p>Function and Product of the Lesson <i>The function is the verb, usually a Bloom’s verb (e.g., analyze, interpret, recount), that guides the language objective of the lesson. This includes a product that students will either write, say, present, or do that involves Academic Language (e.g. essay, present, recount).</i></p>	
<p>Classify Communicate Academic Vocabulary <i>What specialized terms and phrases do students need to understand and use to complete the function?</i> Invertebrates- organisms without a backbone (New) Vertebrates- organisms with a backbone (New)</p>	
<p>Content Vocabulary <i>What are the key vocabulary words, symbols, or sounds in this lesson?</i> Classify- to put things into groups (New) Category- a group of things that have similar characteristics (Review)</p>	
<p>Syntax and/or Discourse (not Early Childhood) Syntax <i>What are the specific ways or conventions for organizing symbols (e.g., linear, horizontal, words (grammar), phrases, or graphics that students need to know to be able to do what you are asking?</i> Discourse <i>What are the specific ways in which members of a discipline (e.g., scientist, historian, etc.) talk, write, and communicate knowledge that students need to know to be able to do what you are asking (e.g., essays, presentations, performance, journal, debate, historical account, signal)?</i></p>	
<p>Language Supports <i>What general instruction will you provide to help students in the whole class (e.g., word walls, learning partners, guided notes) learn the discourse/syntax? What focused instruction (e.g., Venn diagrams, graphic organizers, outlines, student examples, sentence stems) will you provide to help students learn the discourse/syntax (can be completed in small groups)? What individual instruction that targets the needs of an individual student(s) will you provide to help that student(s) learn the discourse/syntax? What opportunities will you provide for students to practice language/vocabulary and develop fluency? What tools (e.g., EQ or vocabulary board, Venn diagram, anchor chart, vocabulary cards, graphic organizer, peer support, sentence stems, pictures, table, chart, thinking map, modeling, sort, song, body movements, games) will you use to help students meet the language demands?</i></p>	
<p>General Supports – <i>Strategies used to support the whole class and may be used to support more than one demand (e.g., Venn diagram, learning partners, word wall, anchor chart, vocabulary cards, graphic organizer, sentence stems, pictures, table, chart, thinking map, modeling, sort, song, body movements, games). These strategies can cross disciplines and be used in a variety of lessons.</i></p> <p>The words will be written on sentence strips and placed on the word wall, after the lesson. There will be vocabulary cards if needed to those students who need additional support.</p> <p>Targeted Supports – <i>Strategies that focus toward a specific language demand (e.g., Venn diagrams, graphic organizers, outlines, examples, sentence stems). These may be addressed during small groups. These can be general supports that are modified for specific students or groups of students.</i></p> <p>The teacher candidate will give students graphic organizers so they can place their thoughts on paper. The teacher will place students in small groups, if students need additional help or they are advancing with classification.</p> <p>Individual Supports – <i>Supports used to target the specific needs of an individual student (e.g., ELL, student with autism, struggling reader or writer, student with significant language delays). These students may or may not have been formally identified and may or may not have an IEP or 504 plan.</i></p>	

The teacher candidate will work one on one with students who have autism or are struggling with animal characteristics.

Language Theory/Rationale: I am _____ because my students need _____. This is appropriate because _____. Provide citation (APA, 6th edition) for learning theory and/or research.
 The teacher candidate will be using the word wall and sentence strips for the vocabulary because students need to be able to see these in print. Students should be able to refer to them when they are stuck or confused. The different types of manipulatives are useful because students learn in different ways and it allows for students to choose a hands on material that will be beneficial to their own learning (Morrow, 2014).

Instruction – When designing your instruction, consider when you will implement formal and informal assessments/evaluations, when you will provide feedback, and when you will teach academic language. Therefore, this section should include aspects written above.

Lesson Part	Description of Activities and Instruction (Teacher Does)	Description of Activities and Instruction (Students Do)	Meeting Individual & Group Needs /Learning Styles <i>Plans instruction to meet the needs of individual students. Adaptations are tied to learning objectives. Specific individual or group learning includes requirements in IEP or 504 plans.</i>
Set/Motivator: <i>Restate and address your Essential Question. How do you engage student interest in the content of the lesson? How does this relate to previous learning? Use knowledge of students' academic, social, and cultural characteristics.</i>	<ol style="list-style-type: none"> 1. TTC will place the KWL Chart on the wall. 2. TTC will call on students what they know about animals 3. TTC will ask students what they want to know about animals 4. TTC will tell students that s/he will keep the chart up for the next two weeks and at the end they will fill in the last column with what they know. 	<ol style="list-style-type: none"> 1. TL will sit on the carpet and tell the TC what they know about animals. 2. TL will tell TC what they want to know about animals. 3. TL will listen to TC explain the KWL Chart 	<p>The learner will work with the teacher if they are struggling.</p>
Instructional Procedures/Learning Tasks: <i>Provide specific step-by-step details of lesson content aligned with objectives, utilizing a variety of teaching strategies.</i>	<ol style="list-style-type: none"> 5. TTC will transition student's attention to a shoe box. 6. TTC will ask students if they know what invertebrates are? 7. TTC will ask students if they know what vertebrates are? 8. TTC will review the word classify. 	<ol style="list-style-type: none"> 4. TL will focus their attention on the teacher's shoe box. 5. The students will answer the question about invertebrates. 6. TL will answer the question about vertebrates. 7. TL will review the 	<p>The learner will copy sentences or words that the teacher writes if the student has an IEP or is vision impaired.</p>

	<ol style="list-style-type: none"> 9. TTC will pull plastic animals out of a show box and ask students which animal classification it belongs to. 10. TTC will have students place the animal in the correct category on the floor. 11. TTC will then explain to students that they are to work in small groups to classify these animals into specific groups. 12. TTC will call on tables to go back to their seats. 13. TTC will not tell the students how to classify animals; it is completely up to the groups. 14. TTC will walk around the room monitoring, observing, and giving feedback when needed. 15. TTC will tell students to keep their classifications quiet from other groups because they do not want their ideas taken by other groups. 16. TTC will hand out anchor chart paper to each group and ask them to transfer their work onto the chart paper. 17. Once each group is finished, TTC will have each group post their paper along the front of the room. 	<p>word classify.</p> <ol style="list-style-type: none"> 8. TL will tell TTC the name of an animal as s/he grabs out of the party. 9. TL will place animals under the correct category, invertebrates or vertebrates. 10. TL will listen to directions. 11. TL will go back to their seats when their tables are called. 12. TL will work with their table groups to place animal cards in groups. 13. TL will not share their grouping techniques with other groups. 14. TL will transfer their work onto anchor chart paper. 15. Each group will place their anchor chart paper on the board. 16. TL will walk around the word and look at other groups papers. 17. TL will take note of the similarities and differences between each 	
--	--	--	--

	<p>18. TTC will instruct students to walk around and look at each piece of chart paper and find the similarities and differences.</p> <p>19. TTC will allow five minutes for this and then s/he will call everyone back to the groups.</p> <p>20. TTC will have students discuss what they have found in terms of similarities and differences.</p>	<p>group's anchor charts.</p> <p>18. TL will come back to the carpet and discuss their findings.</p>	
<p>Questions and/or activities for higher order thinking: <i>These are open-ended and cannot be answered by yes or no. These can be asked at various points throughout the lesson and guide rather than direct student thinking.</i></p>	<p>What two animal classifications could you combine? How or why?</p> <p>Evaluate your classifications, what do you see?</p> <p>Now that you have all of your animals categorized, list what all the animal in each section have in common.</p> <p>How did you persuade any of your group members to agree with you?</p>		<p>Categorize the sections even further, by animal species, color, size, etc.</p> <p>Determine if your classification is correct or not and explain why.</p>
<p>Closure: <i>Makes clear connections to real-world situations and requires students to reflect on and apply their learning through verbal or written expression.</i></p>	<p>TTC will have students turn to their knee partner and discuss what they have learned today and what they would change about the lesson.</p>	<p>The learners will share with their knee partners what we have learned today.</p>	<p>Students with impairments can write down what they have learned today or tell the TC individually.</p>
<p>Material/Resources/Technology: <i>What do you need for this lesson? Identify the specific materials, resources and instructional technologies that you will use. How will you model these technologies to engage students and add value to and improve their learning?</i></p> <p>KWL Chart Shoe box x5 Images of all different types of animals in sets of 4 Plastic animals Two Paper plates with invertebrates written on one and vertebrates written on the other Anchor Chart Paper Markers Index Cards</p> <p>Co-Teaching Strategies Used: <i>(highlight and explain all that apply): One Teach, One Observe; One Teach, One Assist; Station Teaching; Parallel Teaching; Supplemental Teaching; Alternative (Differentiated); Team Teaching</i></p> <p>Station teaching would work the best for this lesson because stations could be set up around the room. The stations would be related to the standard/lesson and would benefit students because they would be in smaller groups.</p>			

Instruction Theory/Rationale: I am _____ because my students need _____. This is appropriate because _____. Provide citation (APA, 6th edition) for learning theory and/or research.

I am reviewing with students how to use base ten blocks and other mathematical strategies because it is important for students to be able to represent their thinking. This is appropriate because if students cannot represent their thinking, they cannot explain how they got their answers. Station teaching is the best co-teaching strategy for this lesson because this lesson is for small groups. While one teacher is teaching this lesson, the other teacher could be working with tier 3 students and getting them to their next level. The lesson is really hands-on because research shows that hands-on activities are more meaningful and students remember more (Morrow, 2014).

Meeting Individual & Group Needs Theory/Rationale: I am _____ because my students need _____. This is appropriate because _____. Provide citation (APA, 6th edition) for learning theory and/or research.

When students work in small groups they focus more on the teacher, they engage more in their work, and they collaborate more. Teachers can provide more individualized instruction to students who are having trouble grasping a new concept because teachers can target student's individual level, and work with them to enhance their learning (Morrow, 2014).

Management/Safety Issues

Management Issues: Explanation of processes and/or procedures, transitions from one activity to another, strategies for gaining attention, motivating students to engage in the lesson and focus on learning (e.g. work boards, posted procedures, modeling, positive feedback, redirection).

The teacher candidate will model how to place animals in the vertebrates or invertebrates categories on the floor.

Safety Issues: Are there any safety issues that need to be considered when teaching this lesson (e.g., outdoor activities, lab experiments, equipment use)? Expectations are explicitly outlined and are included as part of the instructional process.

The only safety issues that would arise in this lesson, is for students would run over each other when they are looking at everyone's charts. The teacher candidate will remind students of the classroom rules.

References

Van de Walle, J. A., Lovin, L. H., Karp, K. S., & Bay-Williams, J. M. (2014). *Teaching student-centered mathematics: Developmentally appropriate instruction for grades pre-k -2* (2nd ed.). Boston, MA: Pearson.

Morrow, L. M. (2014). *Literacy development in the early years: Helping children read and write* (8th ed.). Boston: Pearson.

Complete Lesson Plan #2:

Curriculum Standards	Essential Question	
<p><i>State Curriculum Standards – Underline your language/vocabulary words</i></p> <p>2. LS1 2). Obtain and communicate information to <u>classify</u> animals (vertebrates- mammals, birds, amphibians, reptiles, fish, invertebrates-insects) based on their <u>physical</u> characteristics.</p>	<p><i>What question(s) or big idea(s) drive your instruction?</i></p> <p>What is the importance of identifying animals based on their characteristics?</p>	
<p>Lesson Objective(s) – Student Learning Outcome(s) for this learning experience</p>		
<p><i>Objectives use active verbs, are measureable (if applicable), and link to standards. Consider using Bloom’s Taxonomy or Webb’s Depth of Knowledge.</i></p> <p>The learners will identify the six major animal classifications with 95% accuracy. The learners will distinguish between the different characteristics of each animal in each category.</p>		
<p>Knowing Your Learners</p>		
<p><i>Describe pre-requisite skills students already know that will help them meet the lesson objective(s). What is your evidence that students need this/these skills(s)? This may include pre-assessment data; student personal, cultural or community assets you have gathered and observations you have made concerning your students.</i></p> <p>My learners will already know what the six major animal classifications are. They will know that vertebrates have backbones and invertebrates do not. They know the key characteristics of each classification. Students know about worms and where they live and which category they belong in because they have had open discussions about them. My students know all of this information because we have done activities, discussions, and projects.</p>		
<p>Assessment/Evaluation</p>		
<p><i>How will students demonstrate understanding of lesson objective(s)?</i></p> <p>Informal: <i>How will you monitor student progress towards lesson objectives as you are teaching? (formative assessment)</i></p> <p>Teachers will have students turn to their knee partners and discuss what they have been learning about. Teachers will write down what they observe as students are walking around, observing, and classifying the animals.</p> <p>Formal: <i>What evidence (formative and/or summative) will you collect and how will you document student learning/mastery of lesson objective(s)? A summative assessment is not needed for every lesson, however, it is required for every lesson submitted for CAEP data collection point (e.g., 3000 courses – ECED 3210, READ 3100, SPED 3300, PEXS xxx; 4000 courses – ECED 4680, CUA1 4241, SPED 4710, PEXS xxx, ECED 4780, CUA1 4391, SPED 4850, PEXS xxx).</i></p> <p>Teachers will collect students’ observations to make sure they are accurate and that students actually did it themselves.</p> <p>Academic Feedback: <i>How will you give academic feedback? How will your academic feedback promote student understanding of the learning objective(s) or state standard(s)?</i></p> <p>What previous knowledge did you use to come up with this classification? How did you know that this animal belonged to the amphibian family and not the reptile?</p>	<p>Assessment Modifications</p> <p><i>What modifications will you make on assessments/evaluations for students with diverse and/or special needs (i.e. students with IEP or 504, struggling learners, advanced learners) and will these modifications be within/for small groups or individuals?</i></p> <p>The teacher will have a template already made for students with an IEP. That way all they have to do is fill in the blank spaces.</p>	
<p>Assessment Theory/Rationale: <i>I am administering/giving/collecting _____ because my students need _____. This is appropriate because _____. Provide citation (APA, 6th edition) for learning theory and/or research.</i></p>		
<p>I am collecting students work because it allows teachers to see if students are grasping the concept or not. I am doing a think pair share because it holds students accountable and it allows teachers to see if they were paying attention to the lesson. I am giving students academic feedback because it</p>		

requires students to think harder and elaborate on their ideas (Morrow, 2014).

Academic Language Demands

Function and Product of the Lesson *The function is the verb, usually a Bloom's verb (e.g., analyze, interpret, recount), that guides the language objective of the lesson. This includes a product that students will either write, say, present, or do that involves Academic Language (e.g. essay, present, recount).*

Classify

Academic Vocabulary *What specialized terms and phrases do students need to understand and use to complete the function?*

Vertebrates

Invertebrates

Content Vocabulary *What are the key vocabulary words, symbols, or sounds in this lesson?*

Reptiles

Amphibians

Insects

Syntax and/or Discourse (not Early Childhood)

Syntax *What are the specific ways or conventions for organizing symbols (e.g., linear, horizontal, words (grammar), phrases, or graphics) that students need to know to be able to do what you are asking?*

Discourse *What are the specific ways in which members of a discipline (e.g., scientist, historian, etc.) talk, write, and communicate knowledge that students need to know to be able to do what you are asking (e.g., essays, presentations, performance, journal, debate, historical account, signal)?*

Language Supports *What general instruction will you provide to help students in the whole class (e.g., word walls, learning partners, guided notes) learn the discourse/syntax? What focused instruction (e.g., Venn diagrams, graphic organizers, outlines, student examples, sentence stems) will you provide to help students learn the discourse/syntax (can be completed in small groups)? What individual instruction that targets the needs of an individual student(s) will you provide to help that student(s) learn the discourse/syntax? What opportunities will you provide for students to practice language/vocabulary and develop fluency? What tools (e.g., EQ or vocabulary board, Venn diagram, anchor chart, vocabulary cards, graphic organizer, peer support, sentence stems, pictures, table, chart, thinking map, modeling, sort, song, body movements, games) will you use to help students meet the language demands?*

General Supports – *Strategies used to support the whole class and may be used to support more than one demand (e.g., Venn diagram, learning partners, word wall, anchor chart, vocabulary cards, graphic organizer, sentence stems, pictures, table, chart, thinking map, modeling, sort, song, body movements, games). These strategies can cross disciplines and be used in a variety of lessons.*

The teacher candidate will have the vocabulary written on sentence strips and they will be laminated. This allows students to grab the word and take it to their seats without it getting destroyed. The teacher candidate will also show pictures of the six animal categories if students get confused.

Targeted Supports – *Strategies that focus toward a specific language demand (e.g., Venn diagrams, graphic organizers, outlines, examples, sentence stems). These may be addressed during small groups. These can be general supports that are modified for specific students or groups of students.*

Teachers will use Venn Diagrams in small groups that way students can see how they are similar and different at the same time.

Individual Supports – *Supports used to target the specific needs of an individual student (e.g., ELL, student with autism, struggling reader or writer, student with significant language delays). These students may or may not have been formally identified and may or may not have an IEP or 504 plan.*

Teachers will have students work with others who are on a higher grade level. The teacher candidate will give reading supports to students who are struggling.

Language Theory/Rationale: *I am _____ because my students need _____. This is appropriate because _____. Provide citation (APA, 6th edition) for learning theory and/or research.*

I am giving my students the vocabulary on sentence strips because it gives them a visual aid and students can take it to their desks if needed. I am using pictures to show with the animal

classifications that way students can make the connect between the two. I am using Venn Diagrams in small groups because it allows students to lay out their thinking. I am pairing high level learners and low level learners together because it allows students to work together and help each other (Marrow, 2014).

Instruction – When designing your instruction, consider when you will implement formal and informal assessments/evaluations, when you will provide feedback, and when you will teach academic language. Therefore, this section should include aspects written above.

Lesson Part	Description of Activities and Instruction (Teacher Does)	Description of Activities and Instruction (Students Do)	Meeting Individual & Group Needs /Learning Styles <i>Plans instruction to meet the needs of individual students. Adaptations are tied to learning objectives. Specific individual or group learning includes requirements in IEP or 504 plans.</i>
<p>Set/Motivator: <i>Restate and address your Essential Question. How do you engage student interest in the content of the lesson? How does this relate to previous learning? Use knowledge of students' academic, social, and cultural characteristics.</i></p>	<ol style="list-style-type: none"> 1. The teacher candidate will call students to the rug. 2. The teacher candidate will review invertebrates and vertebrates with students. 3. The teacher candidate will review content vocabulary with students and ask for students to give an example of each. 	<ol style="list-style-type: none"> 1. Students will walk to the rug. 2. Students will listen and review invertebrates and vertebrates with the teacher. 3. Students will listen to the review of content vocabulary and give an example of each. 	<p>Students will be placed in groups that have higher leveled learners that can assist them.</p>
<p>Instructional Procedures/Learning Tasks: <i>Provide specific step-by-step details of lesson content aligned with objectives, utilizing a variety of teaching strategies.</i></p>	<ol style="list-style-type: none"> 4. The teacher candidate will tell students that they will be walking around the room, watching videos of certain animals in their natural habitats, and identifying them. 5. The teacher candidate will also inform students that they are to write down what they observe. 6. The teacher candidate 	<ol style="list-style-type: none"> 4. Students will listen to directions. 5. Students will pay attention to their assigned number. 6. Students will collect their materials. 7. Students will go to their station that matches their number. 8. Students will watch the video 	<p>The teacher candidate will give these students a structured sheet that way students only have to fill in the boxes and lines.</p>

	<p>will number off students and tell them which station they will start at.</p> <ol style="list-style-type: none"> 7. The teacher candidate will pass out notebook paper and tell students to grab their clipboards and pencils. 8. The teacher candidate will tell students to go to their numbered sections. 9. The teacher candidate will select one student from each group to hit play on the videos. 10. The teacher candidate will walk around observing and taking notes of what they hear students saying. 11. The teacher candidate will give students five minutes at each station and then s/he will yell switch. 12. The teacher candidate will call everyone back to the carpet once everyone is done. 13. The teacher candidate will have students discuss their findings. 	<p>and write down what they observe and then write which animal classification it belongs to.</p> <ol style="list-style-type: none"> 9. The selected students will press play on the videos. 10. Students will work within their group if they are confused. 11. Students will spend five minutes at each station. 12. Students will come back to the carpet and discuss what they observed and their findings. 	
<p>Questions and/or activities for higher order thinking: <i>These are open-ended and cannot be answered by yes or no. These can be asked at various points throughout the lesson and guide rather than direct student thinking.</i></p>	<p>Why did you classify this animal in this category? What physical attributes helped you determine its correct place on your paper? Students will list another animal that belongs in each category.</p>	<p>What animals did you find and what categories did you put them in?</p>	

<p>Closure: <i>Makes clear connections to real-world situations and requires students to reflect on and apply their learning through verbal or written expression.</i></p>	<p>The teacher candidate will ask students to relate what they did to the real world and share.</p>	<p>Students will relate what they did to the real world and share it with their peers.</p>	<p>Students will tell the teacher how it relates to the real world if they get overwhelmed speaking in front of everyone.</p>
---	---	--	---

Material/Resources/Technology: *What do you need for this lesson? Identify the specific materials, resources and instructional technologies that you will use. How will you model these technologies to engage students and add value to and improve their learning?*

- A video of an animal from each animal classification
- Six Computers
- Or parent volunteers that bring in animals
- Clipboards
- Pencils
- Sentence Strips
- Notebook Paper
- Structured Sheets for students who need additional help
- Clown Fish: <https://www.youtube.com/watch?v=p2MoXON8INI>
- Elephants: <https://www.youtube.com/watch?v=LpzwxDqVDtc>
- Alligators <https://www.youtube.com/watch?v=qQTYf169dO4>
- Blue Jays: <https://www.youtube.com/watch?v=qQTYf169dO4>
- Crickets: <https://www.youtube.com/watch?v=iVDe-StJskI>
- Red Tree Frog: <https://www.youtube.com/watch?v=9xGY0PFz-T0>

Co-Teaching Strategies Used: *(highlight and explain all that apply): One Teach, One Observe; One Teach, One Assist; Station Teaching; Parallel Teaching; Supplemental Teaching; Alternative (Differentiated); Team Teaching*
 The best strategy for this lesson would be team teaching because they could both observe and take notes. They would get more things jotted down and observe more.

Instruction Theory/Rationale: *I am _____ because my students need _____. This is appropriate because _____. Provide citation (APA, 6th edition) for learning theory and/or research*
 I am teaching this because it is one of the major standards students need to know in order to be successful in third grade science. It is appropriate because everything is in their ZPD and it provides a small challenge that is achievable (Van de Walle, 2018)

Meeting Individual & Group Needs Theory/Rationale: *I am _____ because my students need _____. This is appropriate because _____. Provide citation (APA, 6th edition) for learning theory and/or research.*
 I am having students work in partners because they can help each other, and it helps with their social development. It is appropriate because students should be able to record what they see with little to no issues. The teacher can provide students with more one on one instruction in small groups (Marrow, 2014).

Management/Safety Issues

Management Issues: *Explanation of processes and/or procedures, transitions from one activity to another, strategies for gaining attention, motivating students to engage in the lesson and focus on learning (e.g. work boards, posted procedures, modeling, positive feedback, redirection).*
 Keeping everyone in their group could be a management issue. So teachers could have students wear a badge with their numbers on them.

Safety Issues: *Are there any safety issues that need to be considered when teaching this lesson (e.g., outdoor activities, lab experiments, equipment use)? Expectations are explicitly outlined and are included as part of the instructional process.*

If real animals are brought in instead of videos, students will need to know how to approach them and act around them. Students will need to walk and if they do not they will have to sit down.

References

- Van de Walle, J. A., Lovin, L. H., Karp, K. S., & Bay-Williams, J. M. (2014). *Teaching student-centered mathematics: Developmentally appropriate instruction for grades pre-k -2* (2nd ed.). Boston, MA: Pearson.
- Morrow, L. M. (2014). *Literacy development in the early years: Helping children read and write* (8th ed.). Boston: Pearson.

Unit Evaluation Plan (f)

Formative

- The teacher will have students think pair share during whole group time on the carpet.
- The teacher will observe as s/he walks around the room during small group work.
- Teachers will have students turn to their knee partners and discuss what they have been learning about.
- Teachers will write down what they observe as students are walking around, observing, and classifying the animals.
- The teacher will give academic feedback throughout the lessons on each day.
- The teacher will have students do thumbs up, down, and sideways during whole group to check if students are grasping the concepts.

Summative

- The teacher will collect students anchor charts and assess the categories students' label.
- Teachers will collect students' observations to make sure they are accurate and that students actually did it themselves
- The teacher will collect Venn Diagrams and make sure that all of the information is correct for each part.
- The teacher candidate will use a checklist when assessing students dances and songs.

A Letter to Families (g)

Dear Families,

Over the next two weeks, we will be classifying animals based on their physical characteristics. This goes along with our Life Science standards that we have been learning this year. Being able to identify animals is a key concept that students should understand before they go to third grade because the standards and concepts get more complex. Our main focus standard is 2.LS1 2). Obtain and communicate information to classify animals (vertebrates- mammals, birds, amphibians, reptiles, fish, invertebrates-insects) based on their physical characteristics. Students will be doing a lot of hands on activities and experiences. I encourage you to come and help out in the classroom if you would like. I have included some activities that you and your child can do at home, to gain a better understanding.

Activity 1: The first activity is classifying animals into three categories: herbivores, carnivores, and omnivores. I have included three pieces of construction paper and animal cards. All you will need is a permanent marker. You will label each piece of paper with herbivore, carnivore, and omnivore. Then your child will sort the animals and place them on the labeled construction papers. (Herbivore- plant eaters, flat teeth; Carnivores- meat eaters, sharp teeth; Omnivores: eats plants and animals)

Activity 2: The second activity is an activity book. There are six flaps and each animal classification (mammals, reptiles, amphibians, birds, insects, and fish) gets its own flap. On the top of each flap, students will write what the skin of each animal type feels like. Then they will find three to five items lying around the house and glue them inside the flap of each animal. Please do not buy any materials, simple things work wonders for this activity. Students will bring this back to school when they have it completed. It can be any time during the second weeks and we will display them around the room.

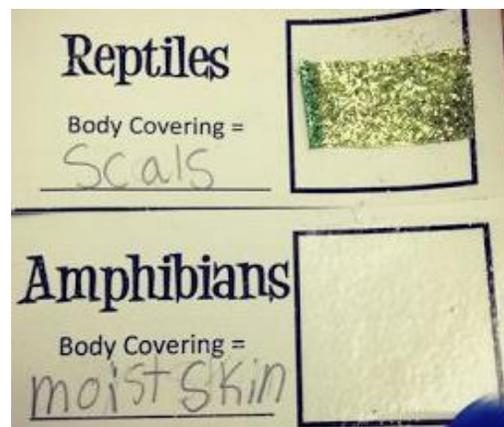
Please do not hesitate to email me or stop by our classroom if you have any questions or concerns.

Ms. Fitzstevens

Activity 1:



Activity 2:



List of References (h)

Teachers

Ashbrook, P. (2013). Water Leaves “Footprints.” *Science and Children*, 50, 32-33. Arlington, VA: National Science Teachers Association.

TN State Board of Education. (2018). *Tennessee Early Learning Developmental Standards (TNELDS) – 4-Year-Olds*. Nashville, TN: TN Department of Education.

Worth, K., & Grollman, S. (2003). *Worms, Shadows and Whirlpools: Science in the Early Childhood Classroom*. Portsmouth, NH: Heinemann. <http://a.co/606jgYd> (ISBN-10: 0325005737. ISBN-13: 978-0325005737)

Science and Children, published by NSTA (national science teacher's association).

An elaboration of the PrimaryConnections 5Es teaching and learning model. (2008, November).

Retrieved from PrimaryConnections Linking Science With Literacy.

Families

<https://a-z-animals.com/reference/animal-classification/>

<http://hamiltonzoo.co.nz/assets/Education-resources/Animals-Classification-Teacher-Notes-Activites-and-Worksheets.pdf>

<https://www.waterford.org/3-great-virtual-field-trips-for-early-learners/>

The Local Library

A Local Museum

Children

BrainPop

http://www.sheppardsoftware.com/content/animals/kidscorner/classification/kc_class_again.htm

<http://interactivesites.weebly.com/animal-classification.html>

<http://www.sheppardsoftware.com/content/animals/kidscorner/games/animalclassgame.htm>

List of Resources Used in the Unit (i)

Materials and supplies

Chart Paper

Markers, Crayons, and Colored Pencils

Playdoh

Jenga Blocks

Magnets

Animals Cards

Hula hoops

Shoe Boxes

Plastic Animals (all sorts)

Toilet Paper Rolls

Rubber Bands

Wax Paper

Fruit Juice

Sugar

Gelatin

Fifty Straws

Straight Jar

Ice Cold Water in a container

Whisk

Food Coloring

Rubber bands

A video of an animal from each animal classification

Six Computers

Or parent volunteers that bring in animals

Clipboards

Pencils

Sentence Strips

Notebook Paper

Structured Sheets for students who need additional help

Construction Paper

Glue

Print and non-print

<http://static.nsta.org/connections/elementaryschool/201709TheEyesHaveItSheet.pdf>

Diary of Worm by Doreen Cronin

What if You Had Animal Teeth? By Sandra Markle

What if You Had Animal Feet? By Sandra Markle

What if You Had Animal Hair? By Sandra Markle

Zack's Alligator By Shirley Mozelle

Let's Classify Animals By Kelli Hicks

The Animal Kingdom by Bobbie Kalman

Actual Size by Steve Jenkins

Technology resources

Clown Fish: <https://www.youtube.com/watch?v=p2MoXON8INI>

Elephants: <https://www.youtube.com/watch?v=LpzwxDqVDtc>

Alligators <https://www.youtube.com/watch?v=qQTYf169dO4>

Blue Jays: <https://www.youtube.com/watch?v=qQTYf169dO4>

Crickets: <https://www.youtube.com/watch?v=iVDe-StJskI>

Red Tree Frog: <https://www.youtube.com/watch?v=9xGY0PFz-T0>

Bill Nye: <https://www.youtube.com/watch?v=dUvXgSI4DdM>

Reptiles: <https://www.youtube.com/watch?v=19CsBSPR14c>

Reptiles and Amphibians: <https://www.youtube.com/watch?v=XI8GPsf6TAc>

Worm: https://www.youtube.com/watch?v=l-zc_1vjLnI

Other

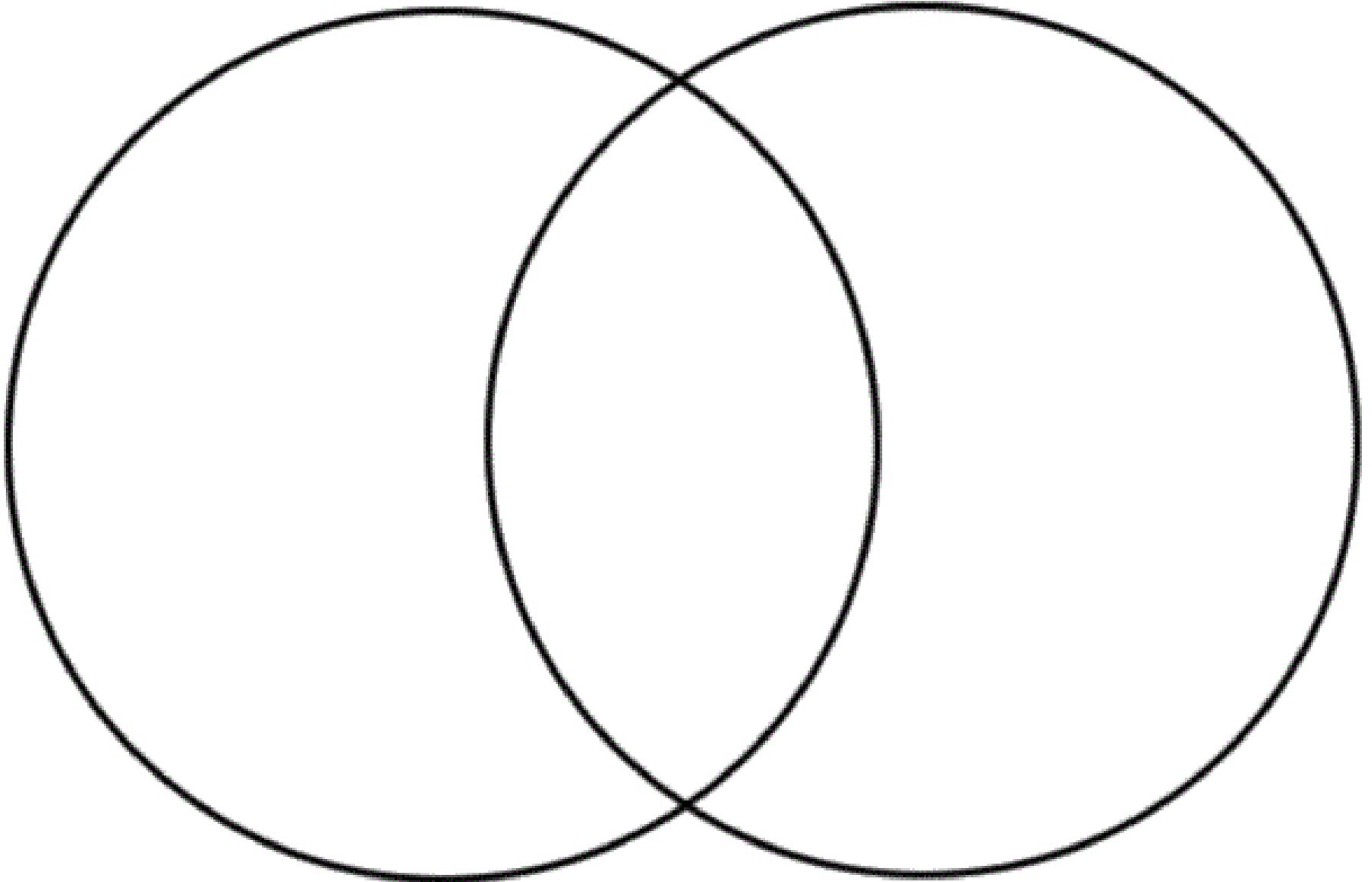
The Eyes Have It

Sketch and describe what you see when you use each type of eye model.

Eyespot Model	Pinhole Eye Model	Compound Eye Model
How is this type of eye the same as and different from your own eye?		

Animal Eye	Human Eye
Type of Animal _____	Type of Object Being Observed _____
If an animal with a _____ looked at this object, I think it would look like.....	When I looked at this object, it looked like.....
The reason I think the object would like this to an animal is because.....	

Name: _____



K

W

L

What I know

What I want to know

What I've learned

BAR GRAPH

