

Name _____

Study Animal _____
(species choice, such as chicken, cow, duck)

Catalog of behaviors

Animal #1 (example)

BEHAVIOR: Your name for the activity or sound	DEFINITION: Detailed description of the activity.	CATEGORY: Movement Vocalization Feeding Interaction	SKETCHES: Stick figures can be very helpful in describing behaviors.
"Mooing"	Cow looks up and makes deep, loud single mooing sound.	vocalization	
"grunting"	Cow snorts and snuffles as it eats and chews.	vocalization	
"grazing"	Biting off pieces of grass and eating them.	feeding	
"wandering"	Slowly moving across the field while eating	Movement/ feeding	
"looking around"	Swings head left and right slowly, eyes open, pauses.	Movement/ interaction	
"chewing cud"	Stops grazing, lifts head, moves lower jaw; crunching	feeding	

Your Name _____ Marcus Johanness _____

Study Animal _____ COW _____
(species choice: for example, chicken, cow, duck)

Animal # 1 (example)

BEHAVIOR: It's name and any sketches (stick figures)	Time 1 <i>10:00-10:05</i>	Time 2 <i>10:15-10:20</i>	Time 3 <i>10:30-10:35</i>
"Mooing"	_____	X	_____
"grunting"	X	XX	_____
"grazing"	_____	_____	_____
"wandering"	_____	X X X	X
"looking around"	X	_____	(no data)
"chewing cud"	X X X	_____	X X

Directions for Behavioral Observations

Create a catalog of behaviors.

1. Observe a few of the animals of the species you are studying. Write down in words or sketches 3 to 5 behaviors (movements, vocalizations, feeding and any interactions with other animals such as touching noses or shoving).
2. Make a catalog of each of these behaviors by giving them a name and a definition. Describe them in detail. Do not try to explain the behavior at first. Just describe it. Sketch the animal in action if possible. Stick figures are fine. Just try to show what you are describing in words through a quick image.
3. Transfer these names you have assigned on your CATEGORY sheet to your OBSERVATION sheet in the first column.

Create an observation sheet for your animal.

4. Make an "X" every time you see the behavior. DO NOT guess. Do not estimate. "About 5 times" is not scientifically accurate, and is considered poor data recording. If you do not know, accidentally skipped a box, or just missed it, just write "no data". This is common, so don't worry about it.
5. **If you observe for one or two minute intervals, here may be time to observe more than one animal. Watch one animal at a time, looking for the three to five behaviors in your catalog.**
6. **Use a new data sheet for each new animal you observe.**

Look for a pattern

Once you have made your observations and recorded them, study your results and think about them. Do you see any pattern in the data that is interesting to you? For example, in the data above, look at "wandering" and "chewing cud". It looks as though when one is happening, the other is not happening. Write down any thoughts or ideas you have after studying your initial observations.

Hypothesis:

A cow does not chew her cud while wandering.

Method:

I am going to watch three more cows, and record my observations. I will be using the same chart as before and recording behavior in two minute

intervals instead of five so I can have a larger sample size (watch more cows).

Results:

There appears to be similar behavior pattern in the second cow.

Conclusions:

Before any kind of conclusion could be drawn with confidence, many more observations would have to be done to confirm whether this is a true correlation or just coincidence. However, if you did observe another animal and get the same results, you could say, "Two cows in the same setting, under similar conditions, displayed the same behavior. Both cows did not chew their cud while wandering and grazing."

Further questions:

Do cows chew their cud at the same time as they graze, or do they stop grazing to chew their cud?

Think about it: *How might this behavior be an adaptation?*

It might not be a good survival tactic to eat and digest "on the run". If cattle did not have to pause to digest, they would be able to just eat and eat and never look up. If they did not look up, they would not be in the habit of watching for predators. Using their time digesting to stop and look around for predators, might enable cattle to remain more alert and notice any danger.