

Veterinary Specialty of the Day:

Internal Medicine

Some veterinarians and veterinary technicians undergo further training to specialize in a specific field of medicine. Veterinarians who specialize in Internal Medicine treat diseases that affect an animal's internal organs, such as the stomach, intestines, kidneys, lungs, and pancreas. Veterinarians can specialize in either Small Animal (such as cats and dogs) or Large Animal (such as cows and horses) Internal Medicine.

Discussion Question

• Can you name any organs in the body? What do they do and why are they important?

Internal medicine specialists are trained to treat...



Diabetes

Diabetes occurs when an animal's pancreas does not produce enough insulin to process the sugar they eat. Sugar will build up in the blood and cannot be used by the body for energy.



Foreign Bodies

Foreign bodies are objects not meant to be inside the body. Sometimes animals ingest foreign bodies, which can then obstruct (block) the digestive tract.



Kidney Disease

Kidneys help filter and remove waste from the blood. Animals with kidney disease cannot filter these toxic waste products.



Pneumonia

Pneumonia refers to inflammation of the lungs. It can be caused by a virus, bacteria, or by something irritating the tissue in the animal's lungs.

Areas of Focus in Internal Medicine

Endocrinology



Endocrinology studies the endocrine system, which controls hormones like insulin that travel through the body and regulate its processes.

Hematology



Hematology studies disorders in the **blood system**, such as anemia where there is a low red blood cell count.

Infectious Disease



Infectious diseases can be caused by foreign **viruses** or **bacteria**. Some only infect one species whereas others can infect many.

Reproductive Medicine



Reproductive medicine studies the **reproductive system**, which is involved in producing baby animals.

Gastroenterology



Gastroenterology studies the **digestive system**, including the esophagus, stomach, and small & large intestines.

Immune Mediated Disease



Immune mediated disease occurs when the **immune system**, which fights off foreign viruses and bacteria, attacks the body instead.

Nephrology & Urology



Nephrology studies **kidneys** while urology studies the organs of the **urinary tract**, such as the bladder.

Respiratory Medicine



Respiratory Medicine studies the **respiratory system**, which helps animals breath and includes the nose, lungs, and airways.

Children's Resources: Veterinary Internal Medicine Schwarzman Animal Medical Center Usdan Institute for Animal Health Education

Activities



PreK - 5th Grade

Anatomy Felt Board

Materials: felt, cardboard or poster board, hot glue, scissors, fabric paint/marker, computer/tablet/phone with internet access

- Felt boards are a fun way for young children to learn while creating art and can also be fun for older children to construct themselves.
- First, you will need to make your own <u>DIY Felt Board</u>. If you have an older child, they can help you construct this by hot gluing a large piece of felt to cardboard or poster board.
- For an "Anatomy" themed felt board, have your child choose which animal they'd like to make pieces for. Once an animal has been chosen, have them paint the outline of the animal on the felt board or cut out one giant felt animal and stick it to the board.
- Have your child research the different internal organs of that animal. You
 can prompt your child with questions such as, "What body parts help a dog
 breathe?" or "What body parts help a cow digest food?" Work alongside your
 child to find the answers online. Some internal organs that may be familiar
 to your older child include the heart, lungs, and stomach.
- Create felt pieces of the organs. Your child can label the pieces with the organ's name.
- If you have a younger child, you can construct the board yourself and let them have fun sticking the pieces on. As they play, make sure to talk about the different pieces. For example, if your child is about to place the heart on the felt board, you can say, "I see you're holding the heart. Did you know the heart pumps blood throughout the whole body of the animal?"
- If you don't have any felt, you can make an anatomy poster instead!

Activities



9th - 12th Grades

Career Exploration: Veterinary Internal Medicine

Materials: computer/tablet/phone with internet access

- The field of veterinary medicine is huge and there are many job opportunities available to those interested in pursuing a career in the field.
- If your child is interested in a career in internal medicine, encourage them to research the various job opportunities and programs that exist.
- Need a place to start? Check out this article on small animal internal medicine specialists: https://vetspecialists.com/what-is-a-board-certified-small-animal-internal-medicine-specialist/

Explore Veterinary Anatomy

Materials: computer/tablet/phone with internet access, coloring pencils/markers

- Older students can explore veterinary anatomy based on medical imaging using https://www.imaios.com/en/vet-Anatomy.
- If your child learns better through hands-on activities, consider a coloring book, such as the <u>Veterinary Anatomy Coloring Book</u>, which has detailed medical illustrations created for veterinary students.

References:

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