VESSELS OF THE ABDOMEN – VENTRAL OR LATEROVENTRAL VIEWS

adrenal lumbar (adrenolumbar) a.
The adrenal lumbar artery is the first lateral branch of the abdominal aorta. It forms one of the 5 major abdominal anastomoses with the deep iliac circumflex artery.

caudal gluteal a.
The caudal gluteal artery is the second lateral branch off of the internal iliac artery.

caudal mesenteric a.
The caudal mesenteric artery is the third ventral branch of the abdominal aorta.

caudal pancreaticoduodenal a.
The caudal pancreaticoduodenal artery is usually the second branch of the cranial mesenteric artery of cats. It is found, as the name suggests, at the caudal end of the duodenum and the right lobe of the pancreas.

caudal vena cava
The caudal vena cava is the vessel that brings all the blood caudal to the diaphragm back to the right atrium of the heart. In the cat it forms at the union of the two common iliac veins.

celiac a. (trunk)
The celiac artery (trunk) is the first anterior (ventral) branch of the abdominal aorta. It gives rise to the hepatic artery (common hepatic artery), the left gastric artery, and the splenic artery.
VESSELS OF THE ABDOMEN – VENTRAL OR LATEROVENTRAL VIEWS

**common iliac a.**
The common iliac artery is usually short and exists between the external iliac arteries and the medial sacral artery of cats.

**cranial gluteal a.**
The cranial gluteal artery is the first lateral branch off of the internal iliac artery, both on the left and right sides of the cat.

**cranial hemorrhoidal (rectal) a.**
The cranial hemorrhoidal (rectal) artery is a branch off of the caudal mesenteric artery of the cat.

**cranial mesenteric a.**
The cranial mesenteric artery is the second ventral branch of the aorta.

**cranial pancreaticoduodenal a.**
The cranial pancreaticoduodenal artery is a branch of the gastroduodenal artery. It forms one of the 5 major abdominal anastomoses with the caudal pancreaticoduodenal artery.

**cystic a.**
Notice the “X”. The cystic artery is on the cranial right side of the “X”. It is a branch of the hepatic artery.
VESSELS OF THE ABDOMEN – VENTRAL OR LATEROVENTRAL VIEWS

The deep iliac circumflex is the fourth lateral branch of the abdominal aorta.

The descending aorta has three major ventral branches and five major lateral branches on each side.

The external iliac artery of the cat is the last lateral branch of the aorta.

Notice the "X". The gastroduodenal artery is on the caudal right side of the "X".

The hepatic artery has two major branches in the cat that we will study. They are the cystic artery and the gastroduodenal artery.

The hepatic portal vein (portal vein) will be yellow in the cats where it has dye in it. It is of functional importance because it is the one vessel that receives blood from the ENTIRE gastrointestinal system.
The ileocolic (ileocecal) artery serves the area around the ileocolic (ileocecal) junction. It is usually the third branch of the cranial mesenteric artery.

The left and right internal iliac arteries are lateral branches of the common iliac artery of the cat.

The second (and terminal) medial branch of the internal iliac artery that we will study in the cat is the internal pudendal artery.

The internal spermatic (testicular) artery is the third lateral branch of the abdominal aorta that we will study. You will note that it branches from the aorta in about the same area that the ovarian artery branches from the aorta, just caudal to the kidney.

The intestinal arteries pass through the mesenteric ligament to the intestines. The intestinal arteries are the terminal branches of the cranial mesenteric artery.

The left colic artery is one of two branches of the caudal mesenteric artery in the cat.
VESSELS OF THE ABDOMEN – VENTRAL OR LATEROVENTRAL VIEWS

**left gastric a.**
The left gastric artery is usually the second branch of the celiac trunk in the cat and is the smallest branch of the celiac trunk in humans.

**lumbar a.**
Normally there are four pairs of lumbar arteries that branch from the posterior surface of the abdominal aorta. In the cat they are most easily seen by lifting the aorta ventrally so that they can be seen exiting the aorta’s dorsal surface.

**median sacral a.**
In the cat the median sacral artery begins where the left and right internal iliac arteries branch from the common iliac artery.

**middle colic a.**
The middle colic artery is usually the first branch off the cranial mesenteric artery. A word of caution - if you pull the colon toward the caudal end of the cat, this vessel, among others, will most likely be broken.

**ovarian a.**
The ovarian artery and vein serve the ovary as their names imply. The ovarian artery is the third lateral branch of the abdominal aorta.

**ovarian v.**
The renal artery and vein are Grant things, they serve the kidney. The renal artery is the second lateral branch of the abdominal aorta that we will study.

The right gastric artery is the first branch of the gastroduodenal artery in the cat. It is so small in the cat that I will not tag it on a practical because it is likely to be destroyed by overzealous students.

The right gastroepiploic artery is a branch of the gastroduodenal artery while the left gastroepiploic artery is usually a branch of the cranial splenic artery.

The splenic artery is the terminal branch of the celiac trunk. It gives rise to the cranial and caudal splenic arteries which serve the spleen.

The umbilical artery is the first medial branch of the internal iliac artery.