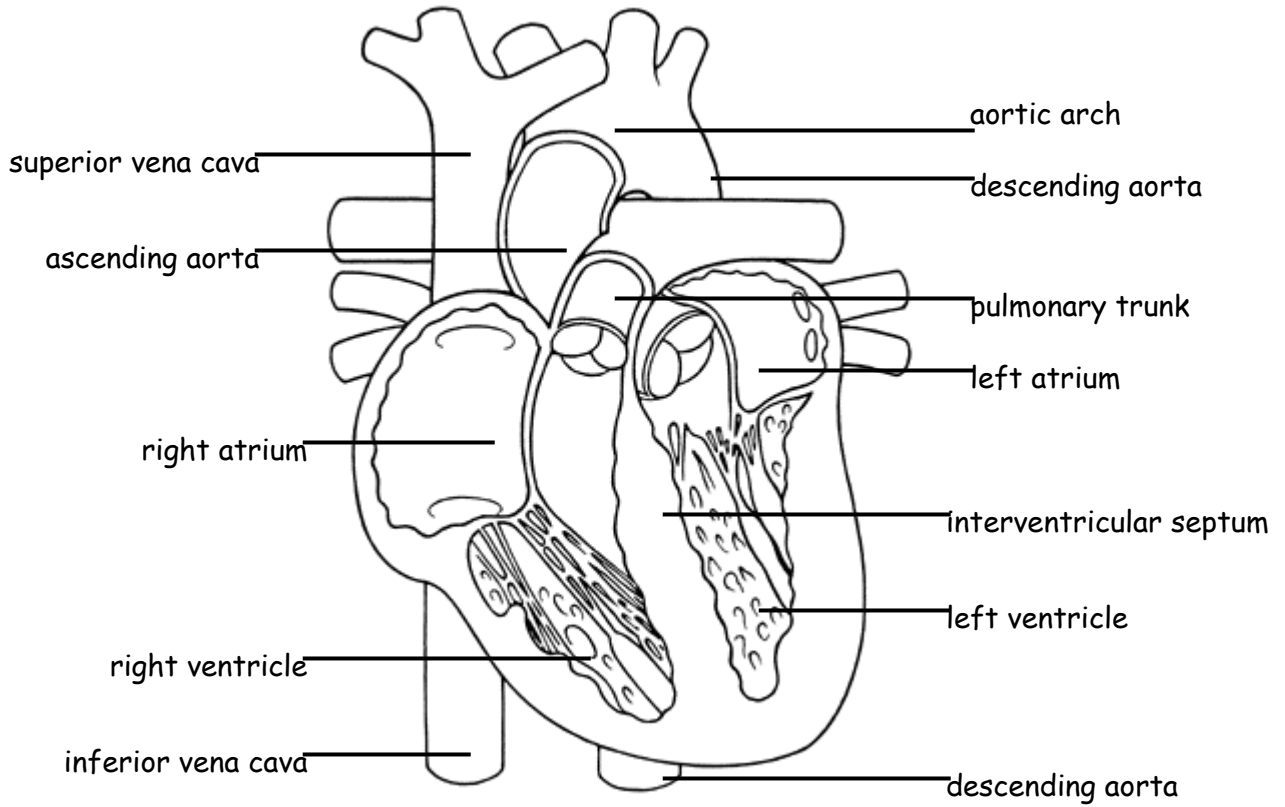


Name _____ Date _____

Label figures as directed.

Label the following on the human heart and associated major blood vessels below: **ascending aorta** (ventral aorta), **aortic arch**, **descending aorta** (dorsal aorta), **pulmonary trunk** (pulmonary artery), **superior vena cava** (right anterior cardinal vein), **inferior vena cava** (enlarged right hepatic vein), **right atrium**, **left atrium**, **right ventricle**, **left ventricle**, **interventricular septum**



Fill in the information concerning the presence/absence or anatomical modification of the heart chambers below for the five organisms indicated.

Heart Chamber	Shark	Teleost	Amphibian	Lizard	Human (Hint: ↑)
Sinus venosus	present	present	present	"absent" sinoatrial node	"absent" sinoatrial node
Atrium	present	present	divided left & right	divided left & right	divided left & right
Ventricle	present	present	present	<u>partially</u> divided left & right	divided left & right
Conus Arteriosus	present	bulbus arteriosus	present	absent	absent

Fill in the information concerning the presence/absence or asymmetric anatomical modification of embryonic Gnathostome aortic arches for the ADULT organisms indicated.

Aortic Arch	Shark	Teleost	Lungfish	Amphibian
I	absent	absent	absent	absent
II	present	absent	present	absent
III	present	present	present	present
IV	present	present	present	present
V	present	present	present	present
VI	present	present	present <u>with</u> pulmonary arteries	present <u>with</u> pulmonary arteries

Aortic Arch	Lizard	Alligator	Bird	Human
I	absent	absent	absent	absent
II	absent	absent	absent	absent
III	present	present	present	present
IV	present	present	<u>right</u> present as aorta; <u>left</u> arch lost	<u>right</u> reduced = base of rt. subclavian; <u>left</u> present as aorta
V	absent	absent	absent	absent
VI	present <u>as</u> pulmonary arteries	present <u>as</u> pulmonary arteries	present <u>as</u> pulmonary arteries	present <u>as</u> pulmonary arteries