Blood Flow Assignment
You must demonstrate your knowledge on the flow of blood through the heart by choosing one of the following assignments:

1. Create a story using the flow of blood as your timeline. For example, the story begins in a fictional location called the “vena cava”…. Have an event take place in each location of the heart that leads to the next location.

2. Create an obstacle course map to indicate the blood flow sequence. The course must be drawn out and each obstacle challenge represents a structure of the heart. The sequence of the course must be in order that represents the flow of blood through the heart.

3. Use clay to construct a model of the heart. You must correctly explain the flow of blood through the heart using your model.

Terms and locations to use:
1. Vena cava
2. Right atrium
3. Tricuspid valve
4. Right ventricle
5. Pulmonary artery
6. Pulmonary valve
7. Lungs
8. Pulmonary vein
9. Left atrium
10. Mitral valve (bicuspid)
11. Left ventricle
12. Aortic valve
13. Aorta

Use the following illustrations as your guide.
Blood flows through the heart in the following manner:

1. **Entering Heart**
   - Right Pump: Collects blood returning from body

2. **Right Pump**
   - Right Atrium
   - Right Ventricle
   - Tricuspid Valve

3. **Lungs**
   - Pulmonary Artery
   - Pulmonary Vein
   - LUNGS

4. **Left Pump**
   - Left Atrium
   - Left Ventricle
   - Mitral Valve

5. **Exiting Heart**
   - Carries oxygen to all parts of Body
   - Aortic Arch
Blood enters right atrium from superior and inferior venae cavae.

Blood in right atrium flows through right AV valve into right ventricle.  
(AV=Atrioventricular)

Contraction of right ventricle forces pulmonary valve open.

Blood flows through pulmonary valve into pulmonary trunk.

Blood is distributed by right and left pulmonary arteries to the lungs, where it unloads CO₂ and loads O₂.

Blood returns from lungs via pulmonary veins to left atrium.

Blood in left atrium flows through left AV valve into left ventricle.

Contraction of left ventricle (simultaneous with step 3) forces aortic valve open.

Blood flows through aortic valve into ascending aorta.

Blood in aorta is distributed to every organ in the body, where it unloads O₂ and loads CO₂.

Blood returns to heart via venae cavae.