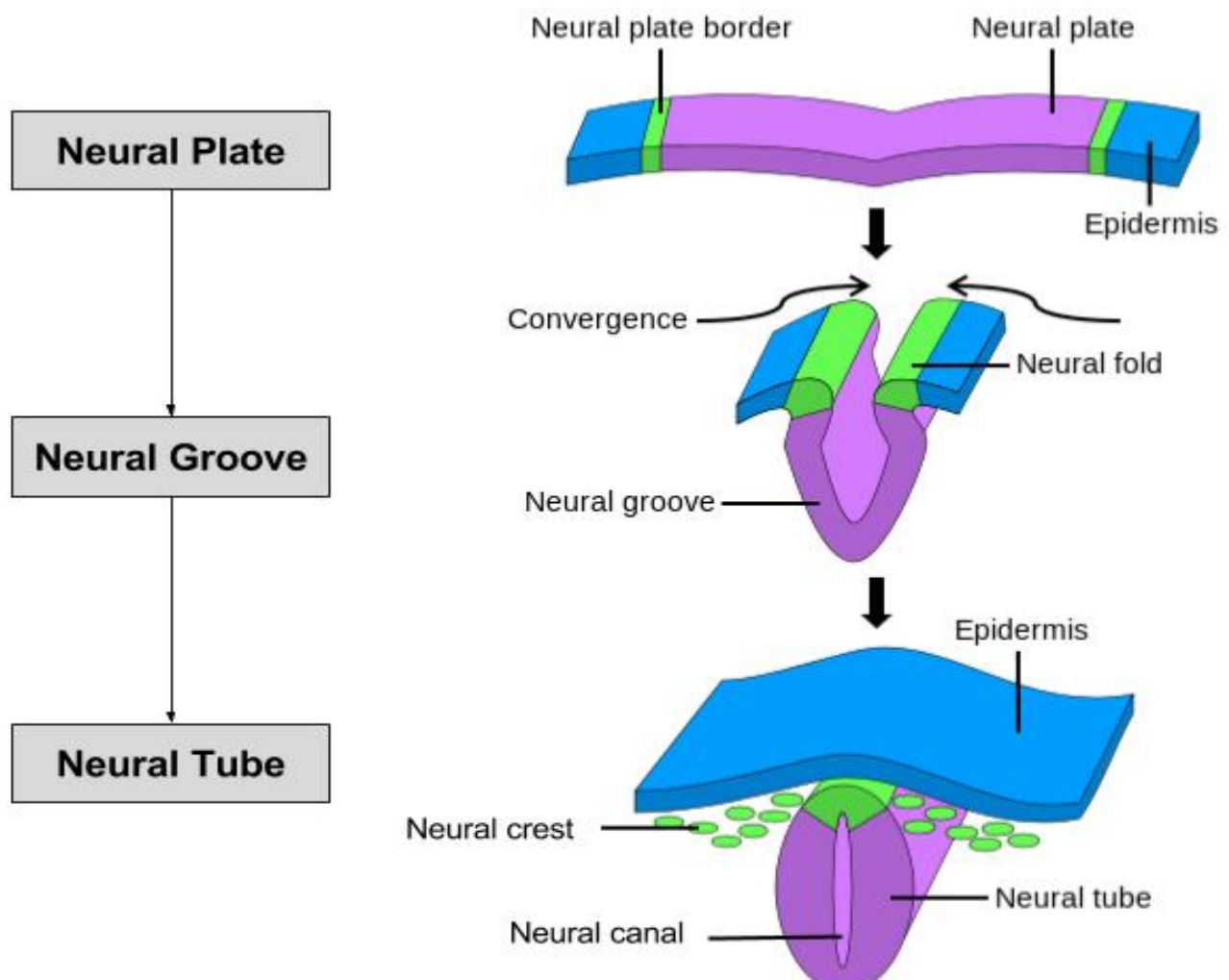
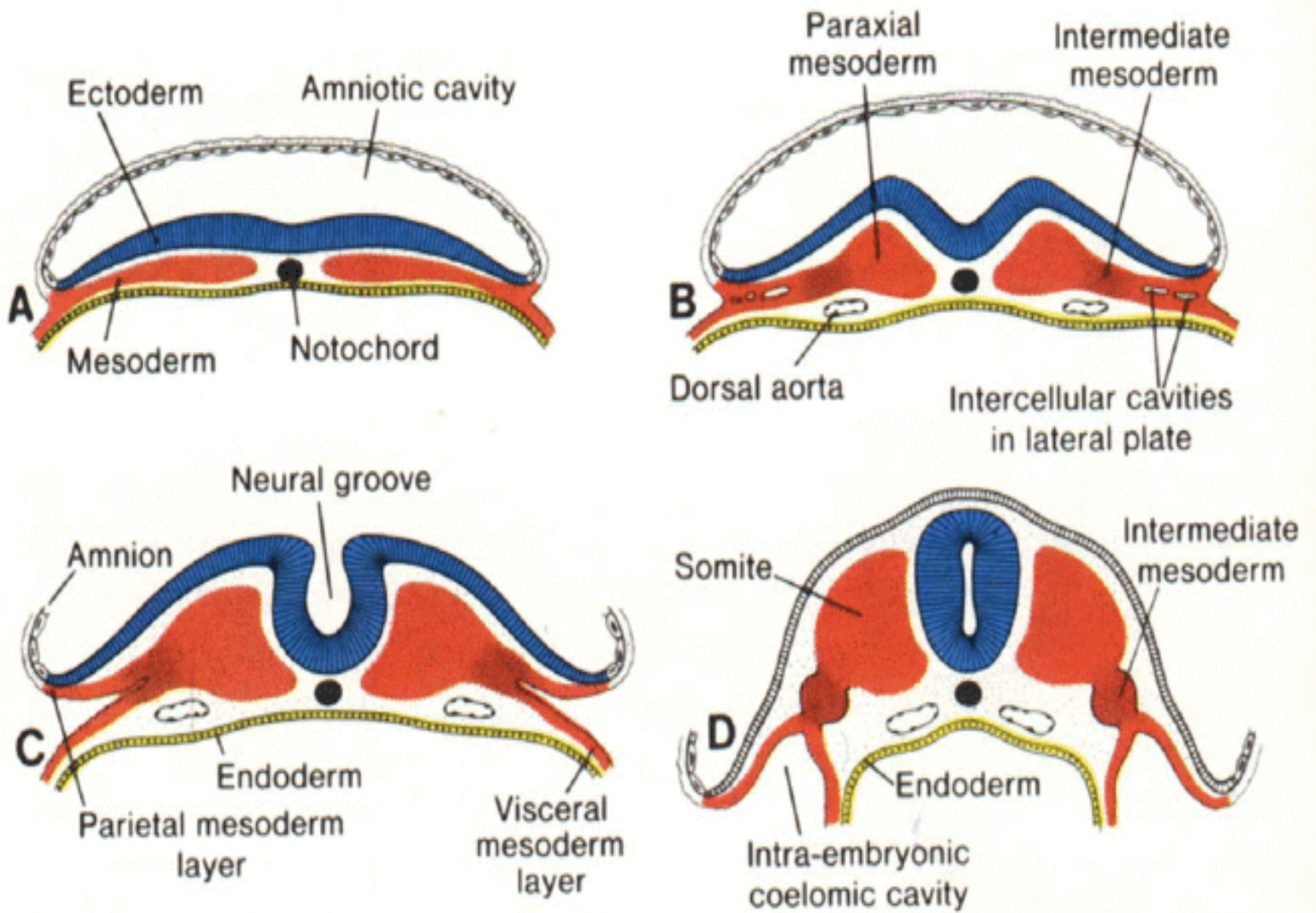


★ Neurulation :

- It is the **beginning** of development of the central nervous system by **formation of the neural tube** as follows :
 1. At the beginning of 3rd. week , the notochord stimulates proliferation of the overlying ectoderm leading to formation of the **neural plate** .
 2. Formation of the **neural groove** & its raised edges form **neural folds**.
 3. **Fusion** of the neural folds , **starts** in the middle of the embryo and **proceeds** in a cranial and caudal directions , with formation of **neural tub** .
 4. The surface **ectoderm regains its continuity** again.
 5. The **fusion** of the folds is **absent** at the anterior & posterior **ends** of the tube leaving 2 openings on the surface ectoderm called **the anterior & posterior neuropores**.
 7. Anterior neuropore closes at 23rd day while posterior neuropore **closed** at 25th day.
 8. The closed neural tube develops into the **brain and spinal cord**.



★ Please see this excellent video for neurulation :
<https://www.youtube.com/watch?v=IGLexQR9xGs>



★ **Dorsal View to the Embryo at the beginning of 3rd. Week**

