

1. Which of the following volume of air cannot be measure by Spirometer?

(A) IRV ~~✓~~

(B) ERV ~~✓~~

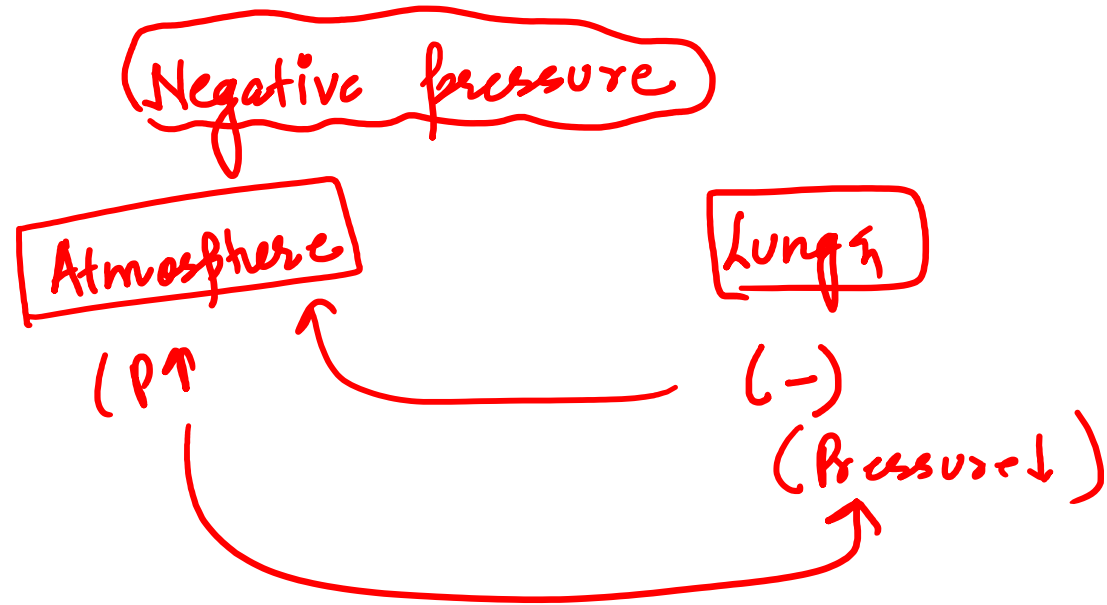
~~(C)~~ RV

(D) Both (A) and (B)

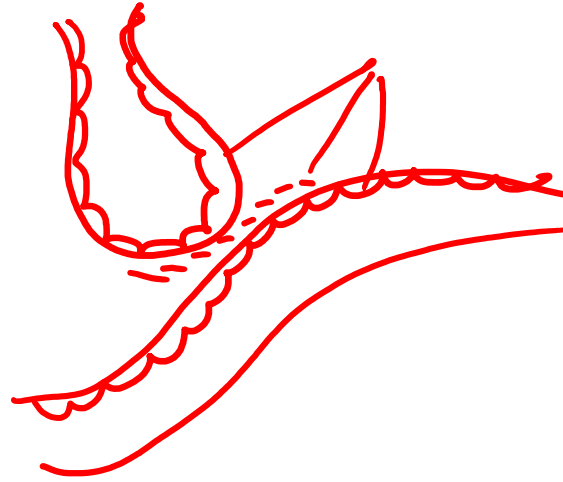
Spirometer

RV

2. During inspiration there is _____ pressure in the lungs w.r.t. atmospheric pressure
- (A) Positive ~~ifrog~~
- ✓ (B) Negative
- (C) Neither positive nor negative
- (D) All of these



3. Diffusion membrane consists of
- (A) Squamous epithelium of alveoli ✓
 - (B) Endothelium of alveolar capillaries ✓
 - (C) ~~Basement substance between them~~
 - ✓ (D) All of the above



4. The partial pressure of CO_2 is minimum in the

- (A) Atmospheric air ✓
- (B) Alveoli ✓
- (C) Deoxygenated blood ✓
- (D) Oxygenated blood ✓

Atmosphere

$\rightarrow P_{\text{CO}_2} = 0.3 \text{ mm Hg}$

5. The volume of air involved in breathing movements can be estimated by using

(A) ECG

(B) Sphygmomanometer

☒ (C) Spirometer

(D) Barometer

Electrocardiograph

↳ (B.P)

6. Membrane separating air in pulmonary alveoli from blood capillaries is:

- (A) Alveolar epithelium ✓
- (B) Cardiac epithelium ✓
- (C) Endothelium of blood capillaries ✓
- (D) Both (A) and (C) ✓



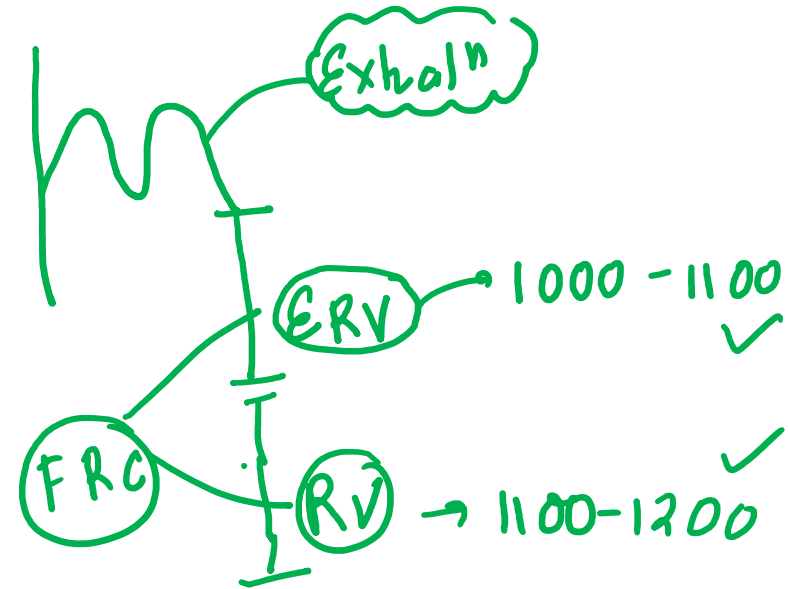
7. Volume of air that will remain in the lungs after a normal expiration is about:

(A) 1200 ml

✓ (B) 2300 ml

(C) 4600 ml

(D) 5800 ml



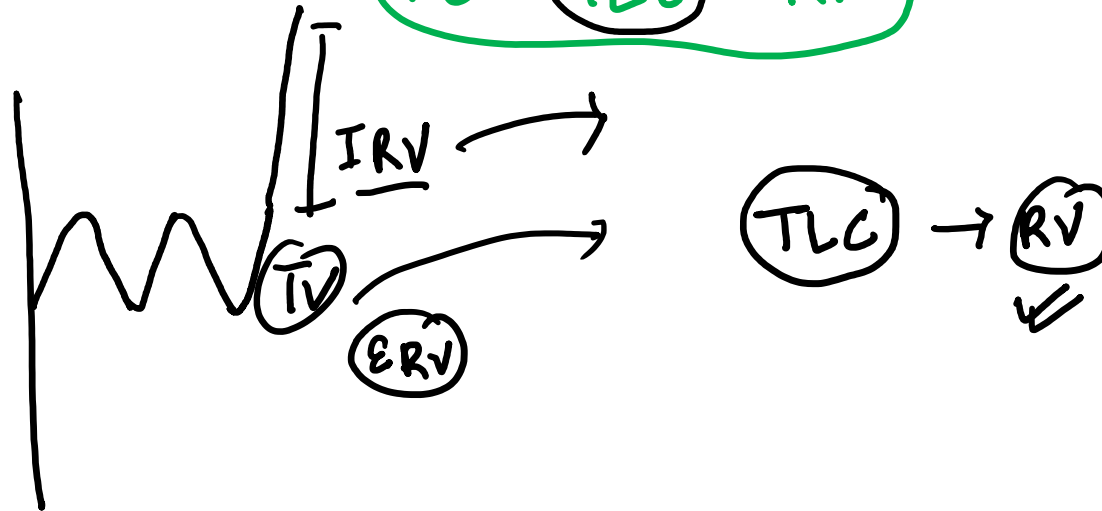
8. Lungs are made up of air-filled sacs, the alveoli. They do not collapse even after forceful expiration because of

- ☒ (A) Residual Volume (RV)
- (B) Inspiratory Reserve Volume (IRV)
- (C) Tidal Volume (TV)
- (D) Expiratory Reserve Volume (ERV)

9. What is vital capacity of our lungs?
- (A) Inspiratory reserve volume plus tidal volume
 - (B) Total lung capacity minus expiratory volume
 - (C) Inspiratory reserve volume plus expiratory reserve volume
 - (D) Total lung capacity minus residual volume

VC → amt of air exhaled after forceful inhalation

$$VC = TLC - RV$$



10. The volume of 'anatomical dead space' air is normally

(A) 230 mL
(C) 190 mL

(B) 210 mL
(D) 150 mL

500ml

150ml