

PFT

MCQs

- A 73 year-old man presents with progressive dyspnea on exertion over the past one year. He reports a dry cough but no wheezes. He is a non-smoker. His pulmonary function testing is as follows: Which one of the followings is a **WRONG** diagnosis?

Test	Pre-Bronchodilator (BD)		% Predicted
	Actual	Predicted	
FVC(L)	1.57	4.46	35
FEV ₁ (L)	1.28	3.39	38
FEV ₁ /FVC (%)	82	76	
FRC	1.73	3.80	45
RV(L)	1.12	2.59	43
TLC(L)	2.70	6.45	42

Select one:

- a. kyphoscoliosis
- b. Idiopathic pulmonary fibrosis
- c. Pulmonary infarction**
- d. Sarcoidosis
- e. Asbestosis

- Which is not a feature of asbestosis?

- a. Increased risk of cancer
- b. Pleural thickening and effusion
- c. Interstitial fibrosis
- d. Obstructive pattern on pulmonary function tests**
- e. Pleural fibrosis

- Which of the following pulmonary function tests most reliably discriminates “pure” chronic bronchitis from emphysema?

- a. Total lung capacity
- b. Functional residual capacity
- c. Residual volume
- d. Single breath diffusing capacity**
- e. Flow at 50% vital capacity

- All the following are causes of low Total gas transfer (TLCO) in respiratory function test Except.

- a- pulmonary fibrosis
- b- pulmonary oedema
- c- emphysema
- d- pulmonary emboli
- e- asthma*******

- In interstitial lung diseases, lung function tests most often show:

- a. **Reduced FEV1 and VC xxx**
- b. Increased total lung capacity (TLC)
- c. Airflow obstruction
- d. Elevated arterial PCO₂.

- Which one of the following pulmonary function values indicates airflow limitation :

- a-FEV1 of 60% of predicted .
- b-FVC of 60% of predicted .
- c-FEV1/FVC of 60% of predicted .**
- d-DLCO of 60% of predicted .
- e- Residual volume of 60% of predicted .

Answer: C. FEV1/FVC of 60%. Total lung capacity (TLC) is used to assess interstitial lung disease. Expiratory flow rate (FEV1/FVC is used to assess obstructive lung disease. Airway obstruction is diagnosed when the FEV1/FVC is <0.7 (70%). (Source: MedStudy Pulmonology 2013, p. 6)

- man with spondylosis, ratio of fev1/fvc is 95% what is the diagnosis?

Restrictive lung disease

- In patients with idiopathic pulmonary fibrosis (usual interstitial pneumonia) all of the followings are expected pathophysiological changes EXCEPT :

- a. Low DLCO .
- b. Decreased FEV1/FVC .**
- c. Severe O₂ desaturation on exercise.
- d. Reduced vital capacity and total lung capacity .
- e. Increased pulmonary artery pressure

Answer: B (increased FEV1/FVC ratio).

Mini-OSCE

Q10 - What test best investigates this finding initially?

a. PFT's

b. ABG's

c. Bronchoscopy with biopsy

d. High resolution CT

e. sputum cultures



Q13)

Smoking patient for long time

ABGs result : Respiratory acidosis (from Table)

What is presentation of patient in PFTs is wronge?

a) $FEV1/FVC \geq 70\%$

b) FVC1 changes less than 12%

c) $FEV1/FVC \leq 70\%$

d) Irreversible condition

نص السؤال غير دقيق ولكن معطيات السؤال ونتائج الـ ABGs كانت
تدل على إنه مريض COPD و irreversible changes