

Case report

# Lung abscess and physiotherapy

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# History and examination

- A 44 year-old male,
- 20 days ago, right chest pain, fever and dyspnea and productive cough
  
- Good general appearance
- No oxygen therapy
- Respiratory rate: 24 cpm
- Sputum (đàm): yellow, viscous (nhớt)

# Objective examination at 3 days ago

- Increased movement of upper chest
- Decreased expansion of right chest wall
- Auscultation in the lower half of right lung:
  - No breath sound (Âm phế bào)
  - Dull percussion (gõ đục)
  - Few crackles (ran)

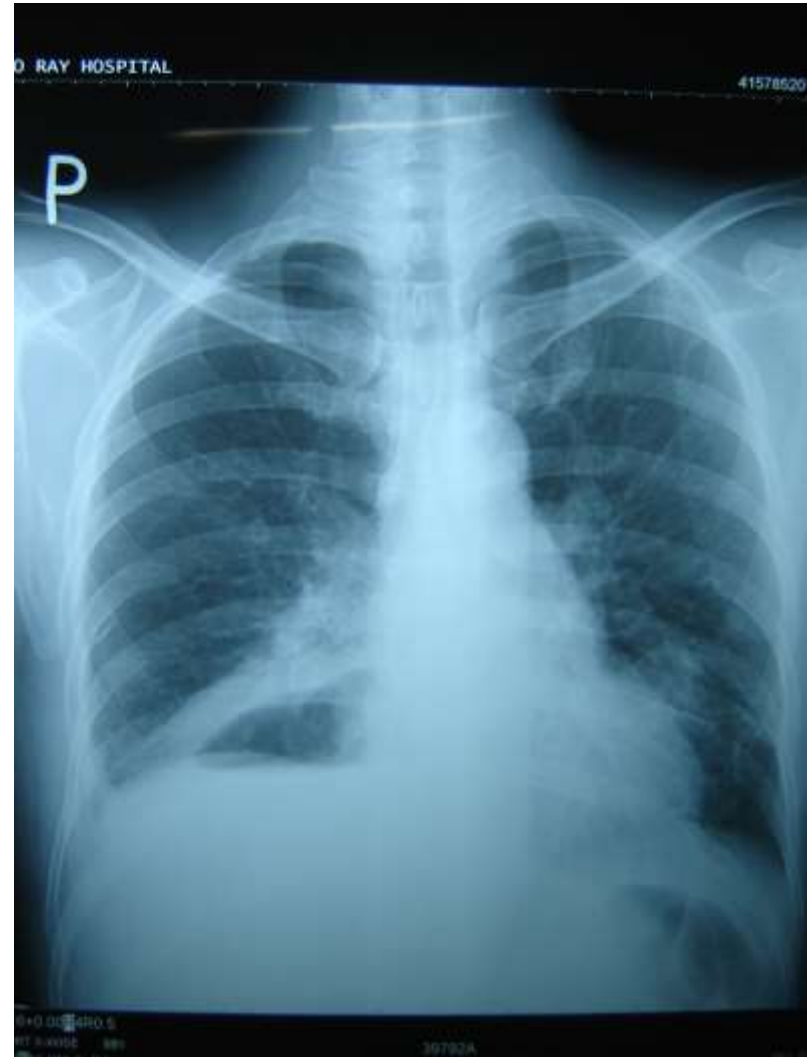


# Radiograph: lung abscess

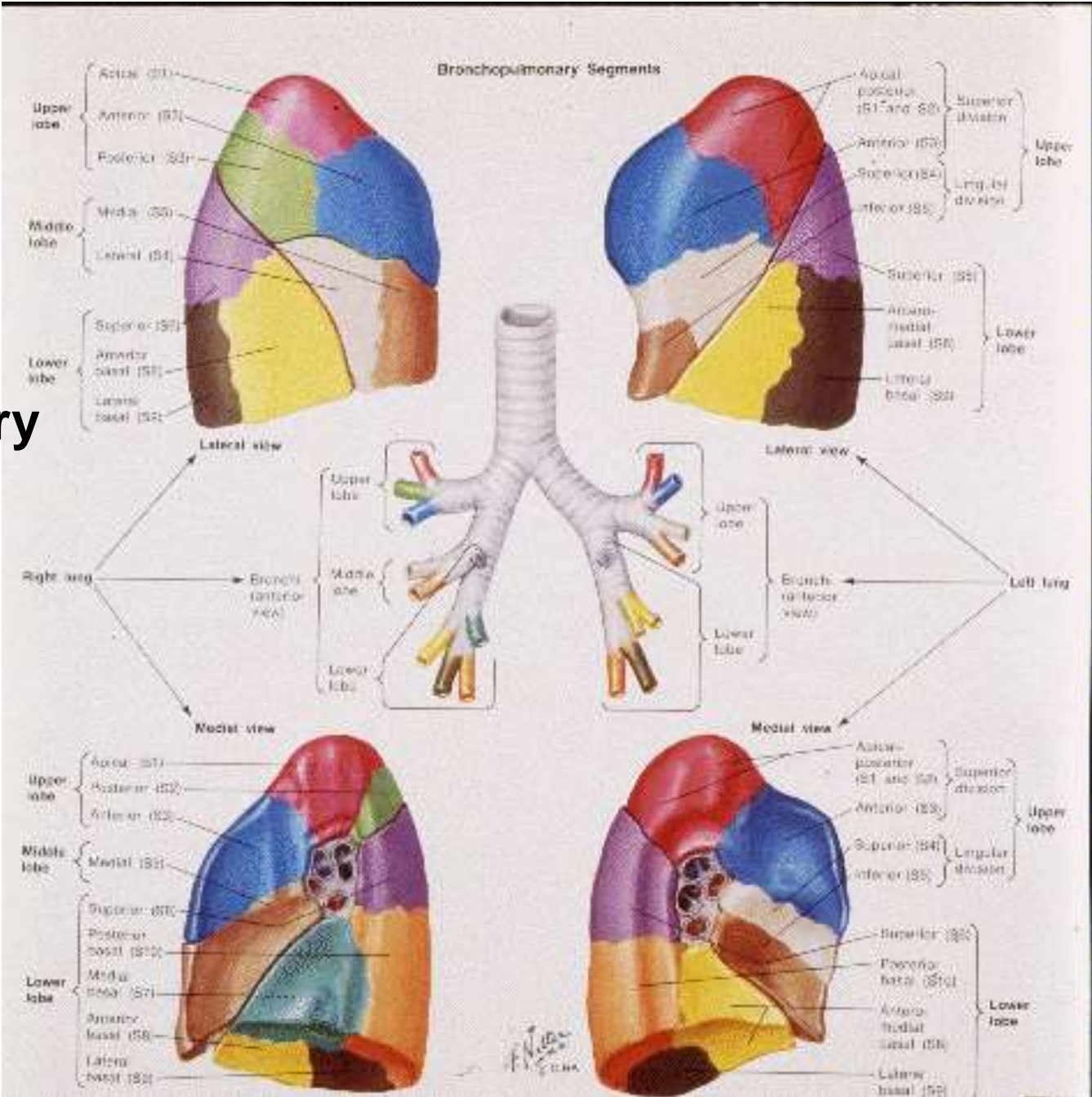
2 weeks ago

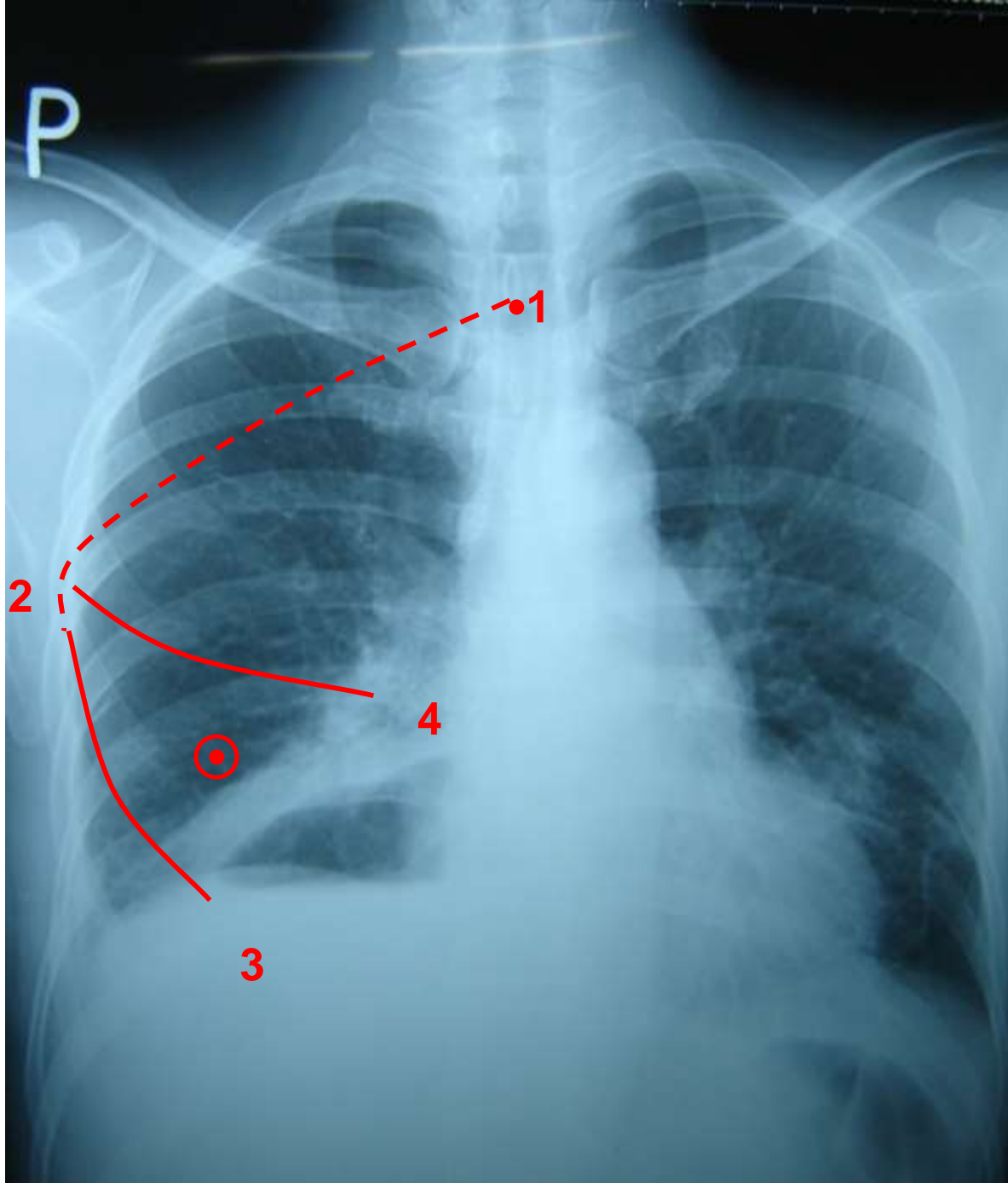


1 weeks ago



# Bronchopulmonary segments





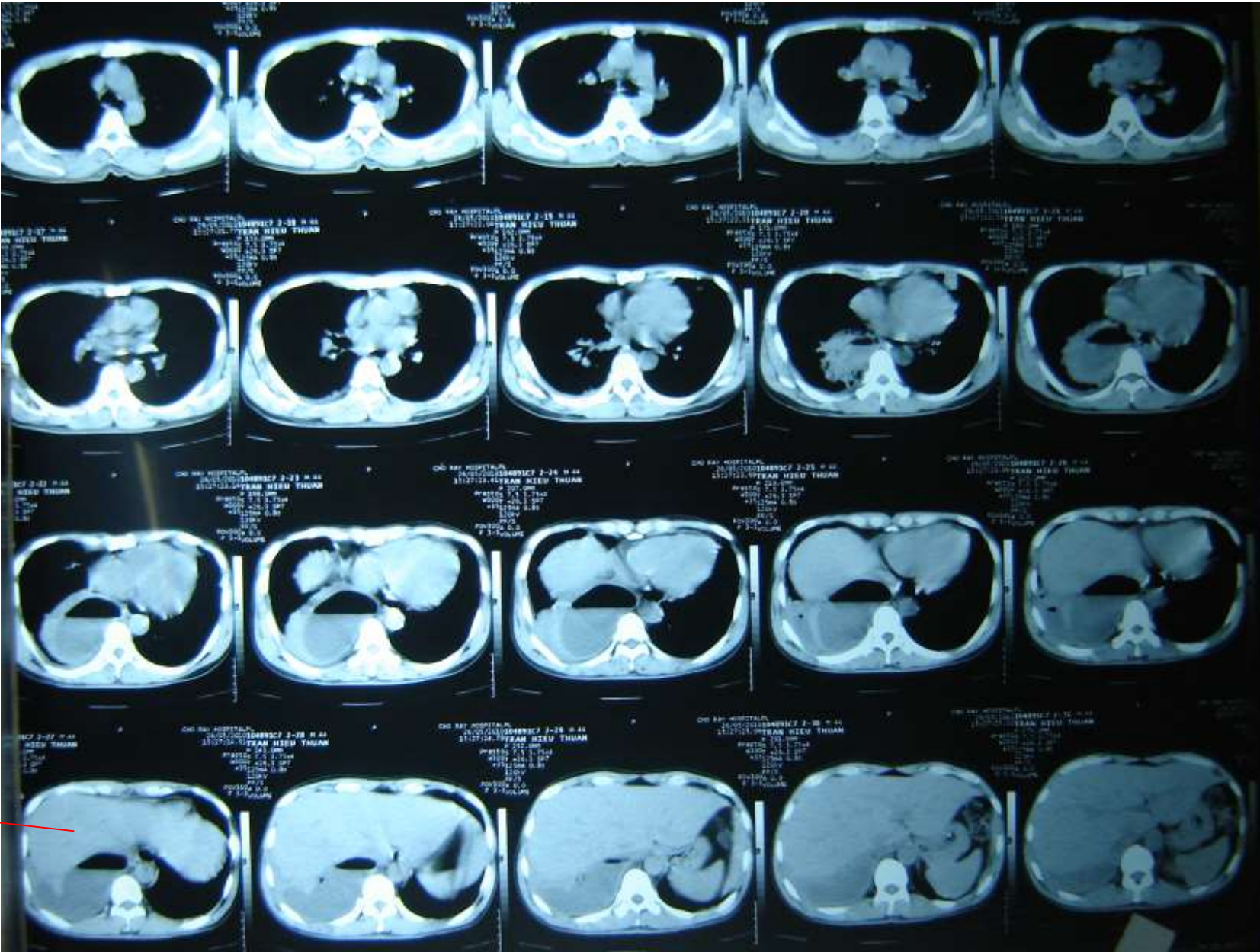
# Landmarks

## Điểm mốc

- 1: Posterior - T3-4
- 2: Mid-axilla - rib 4-5
- 3: Anterior – rib 6
- 4: Anterior – rib 4

Middle lobe  
or lower lobe?

# CT-scanner: mediastinum window



Liver

# CT-scanner: parenchyma window



# Summary

- Pathology (Bệnh): lung abscess
- Impairment(Khiếm khuyết):
  - Obstructed airway (Tắc đường thở)
  - Decreased diaphragm action (Giảm hoạt động cơ hoành)
- Function limitation (Giảm chức năng):  
fatigue (mệt) at daily activities

# Physiotherapy intervention

1. Postural drainage
2. Airway clearance technique (làm sạch đường thở)
  - Breathing strategies
    - **ACBT** (active cycle of breathing technique)
    - **AFE** (*augmentation du flux expiratoire*)
    - Assited cough/huff technique
    - Pursed lip breathing

# Physiotherapy intervention

2. Manual techniques:
  - Chest percussion, vibration, shaking
  - Squeezing
3. Diaphragmatic respiration.
4. Aerobic exercise

# Dẫn lưu tư thế (Postural drainage)



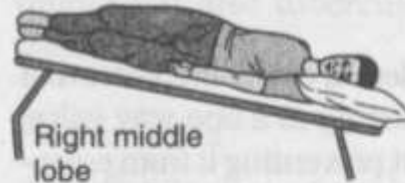
Apical segments  
upper lobes



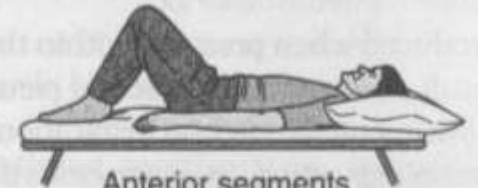
Posterior segment  
right upper lobe



Posterior segment  
left upper lobe



Right middle  
lobe



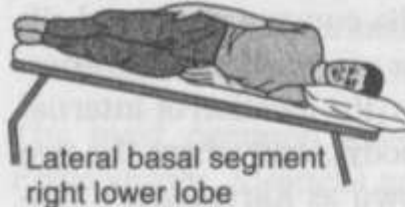
Anterior segments  
upper lobes



Anterior basal  
segments



Apical segments  
lower lobes



Lateral basal segment  
right lower lobe



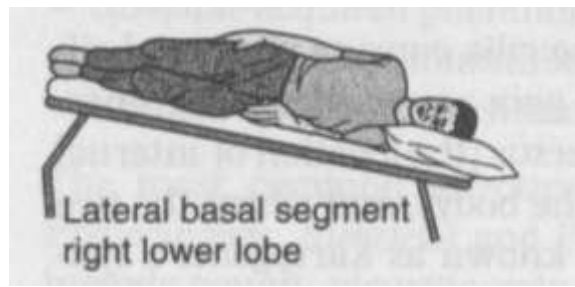
Lingula

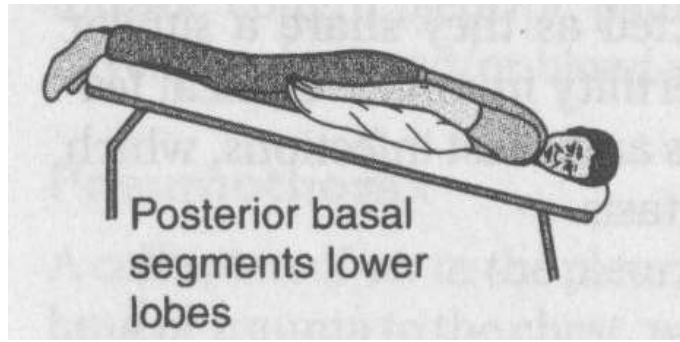


Posterior basal  
segments lower  
lobes



Right medial basal  
and left lateral basal  
segments lower lobes





Any question?