

# OSCE Answer

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# Case 1

1. How can you assess from the x-ray whether a reduction of Colles' fracture is satisfactory or not ? (2 marks)

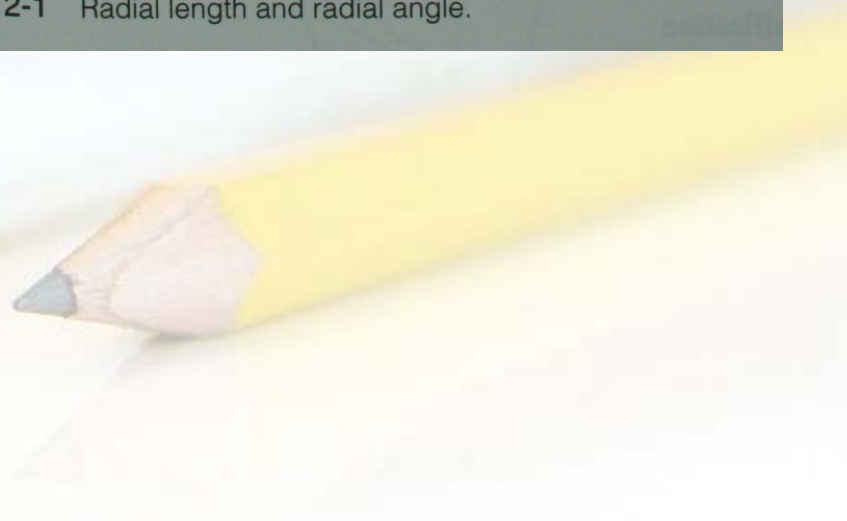
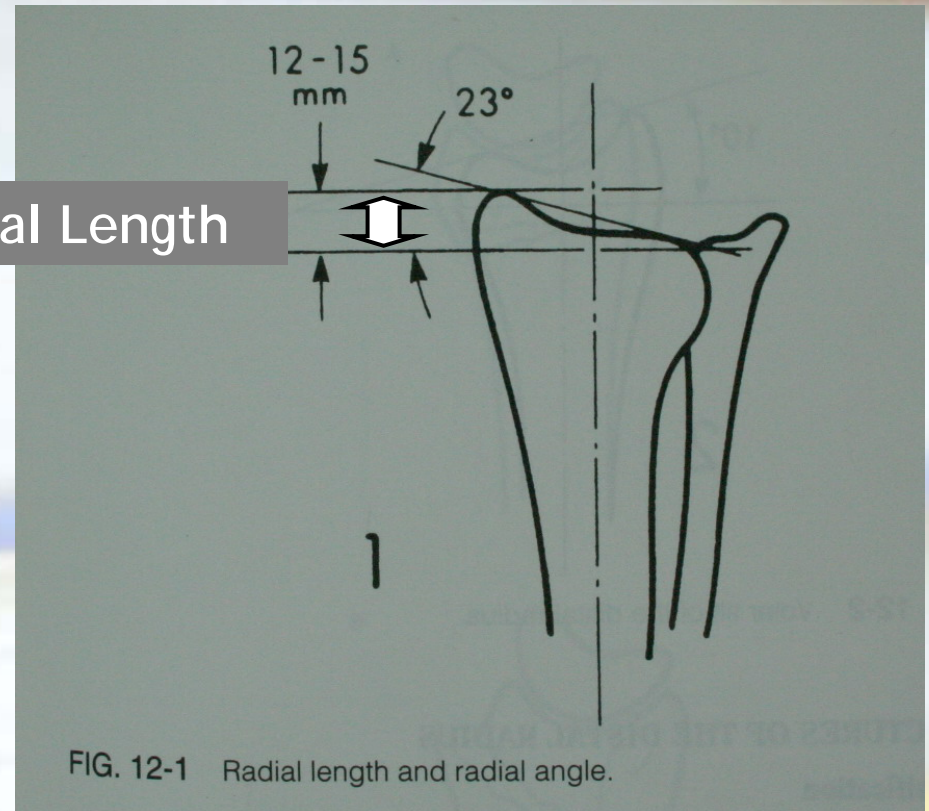
A: Reduction is not satisfactory if:

AP view: radial length > 5 mm displaced

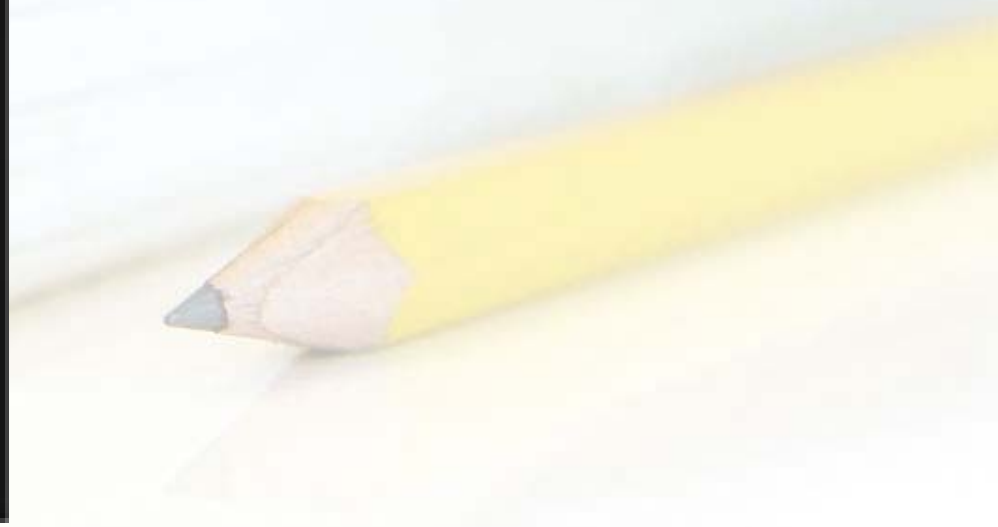
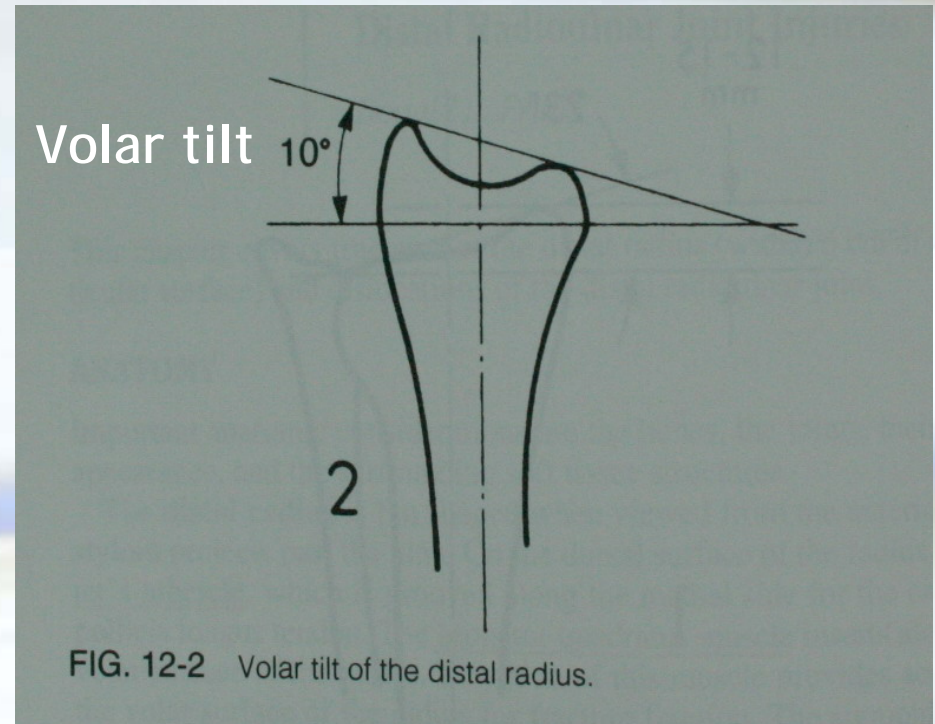
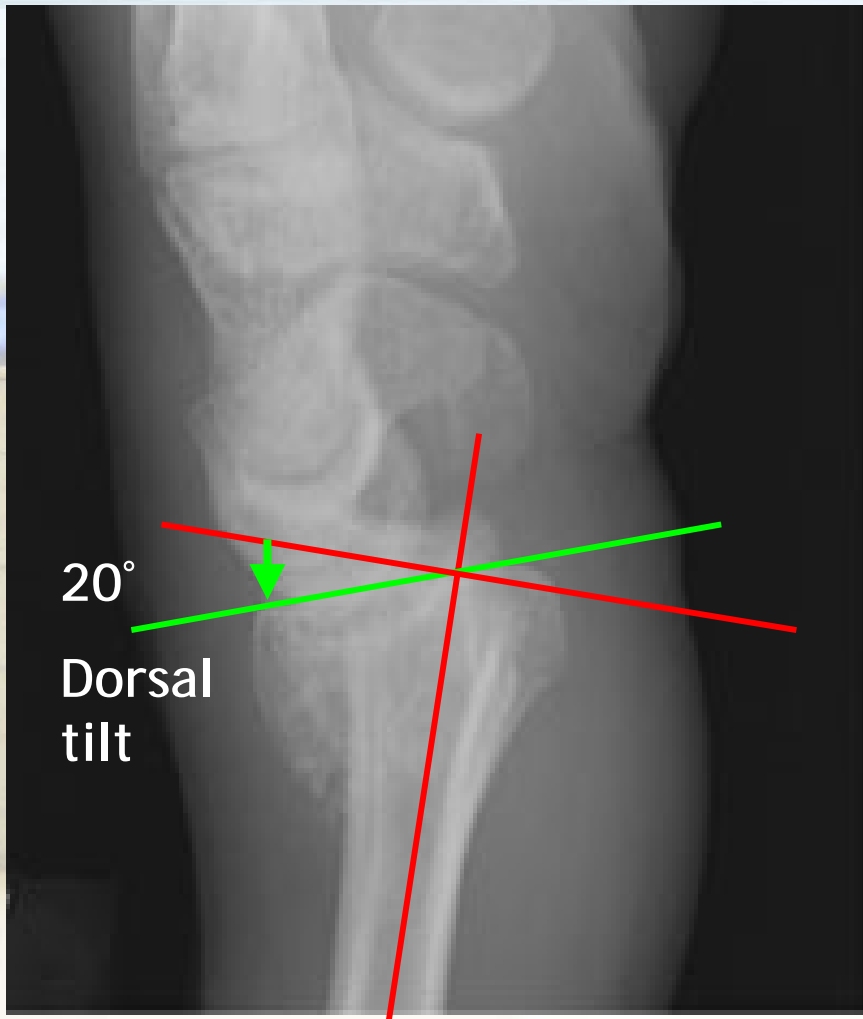
Lat view: dorsal tilt > 10 degrees

# Case 1

Radial Length



# Case 1





# Case 1

2. During follow-up for Colles' fracture, what movement of hand will you be specifically interested ? (2 marks)

A: Extension of interphalangeal joint (IPJ) of thumb

# Case 1

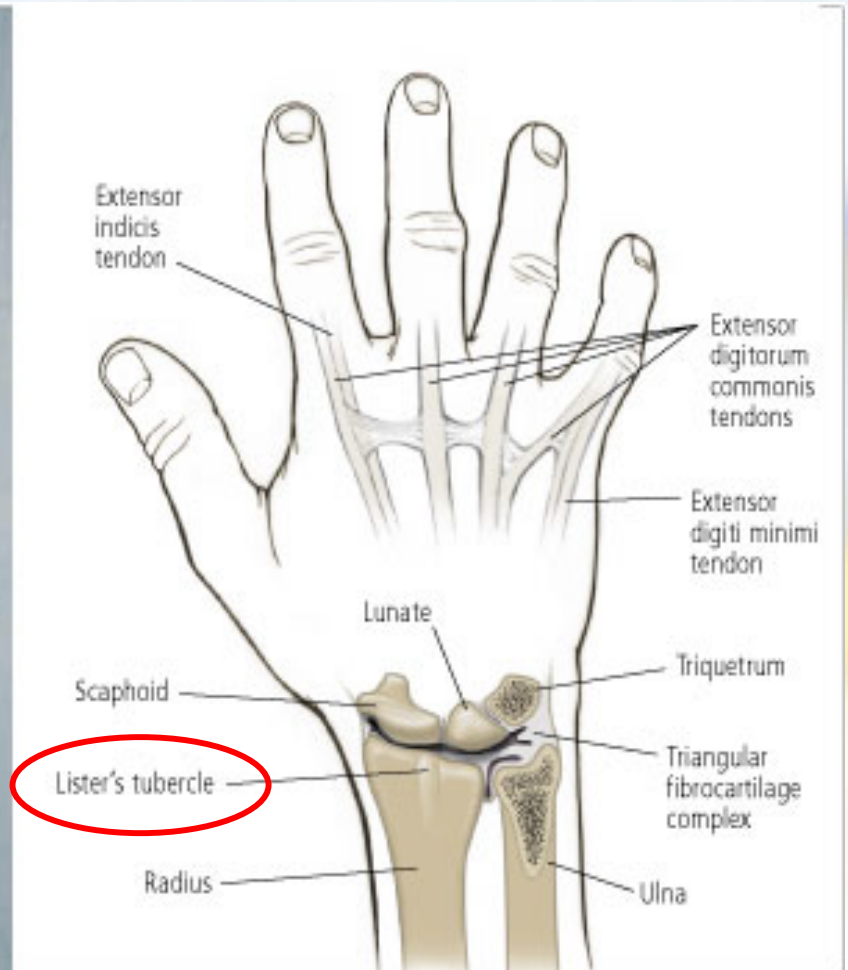
3. What are the cause & the underlying pathology?  
(3 marks)

A: **Delayed** rupture of extensor pollicis longus (EPL)  
due to devascularization of the tendon  
near the Lister's tubercle by fracture of distal  
radius

# Case 1

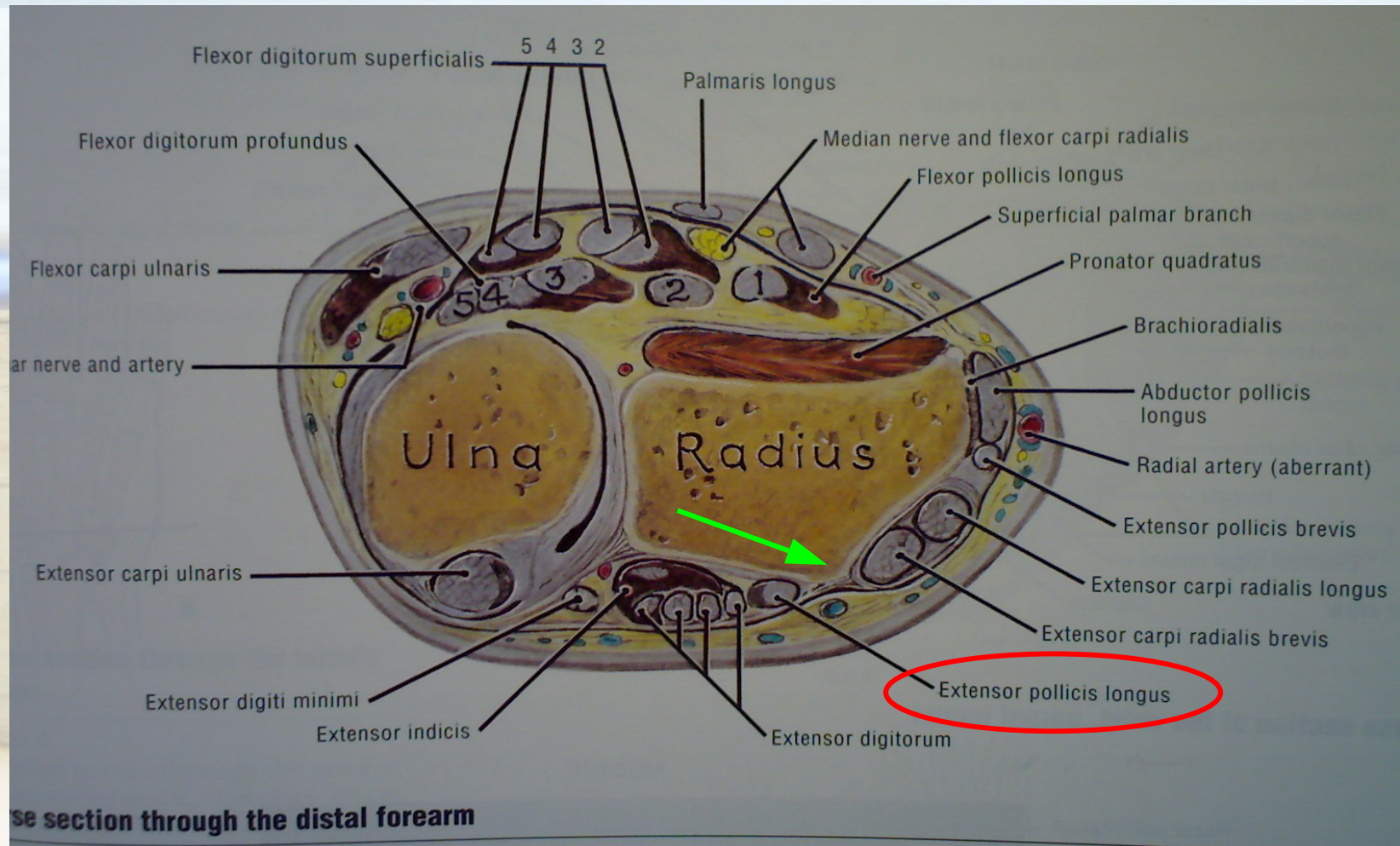


# Case 1





# Case 1



# Case 1

4. Name one etiology that may also result in same pathology. (2 marks)

A: Rheumatoid arthritis



## Case 2

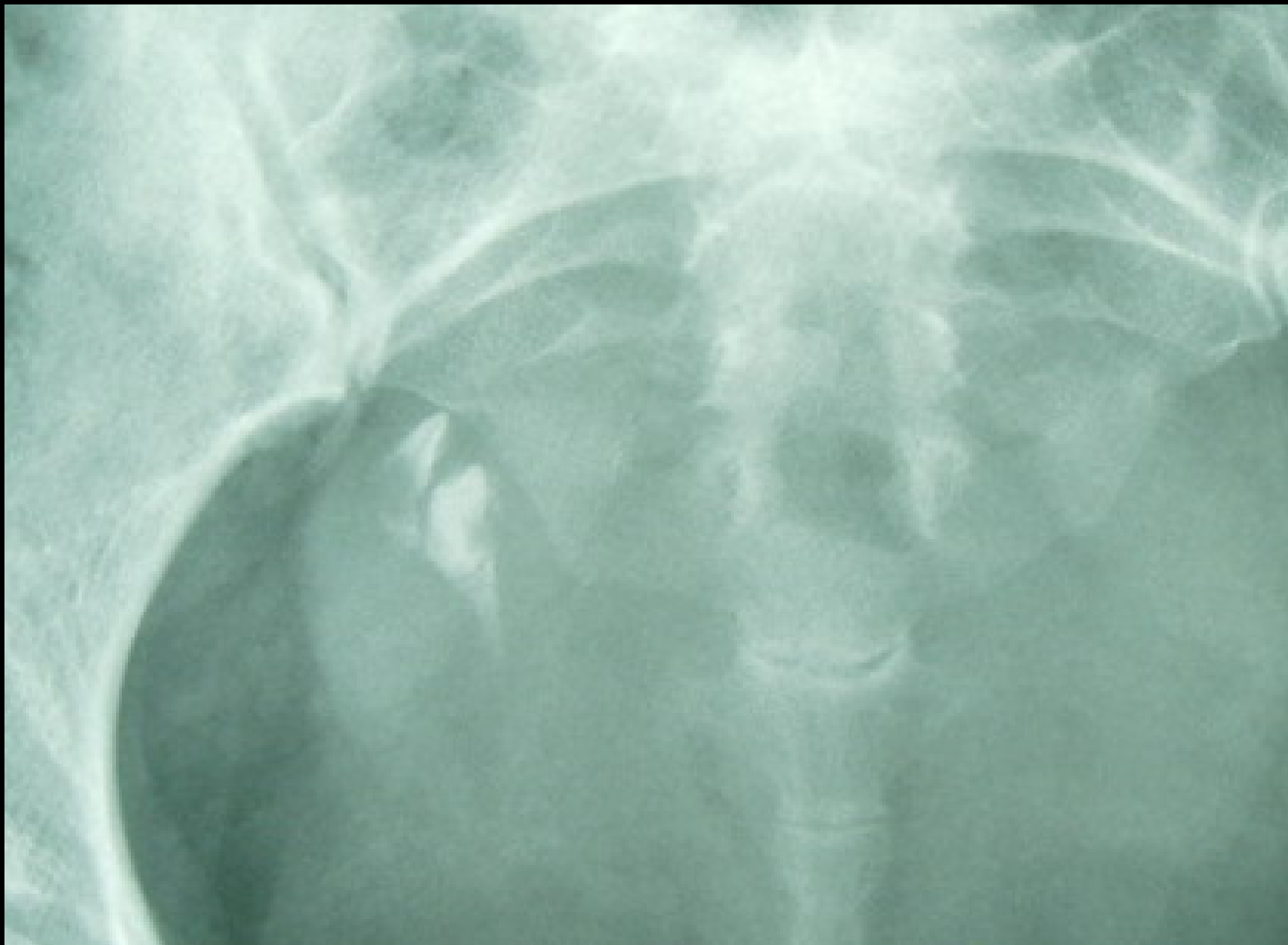
- A 24 year-old lady complained of right abdominal pain for 1 week. AXR was taken.



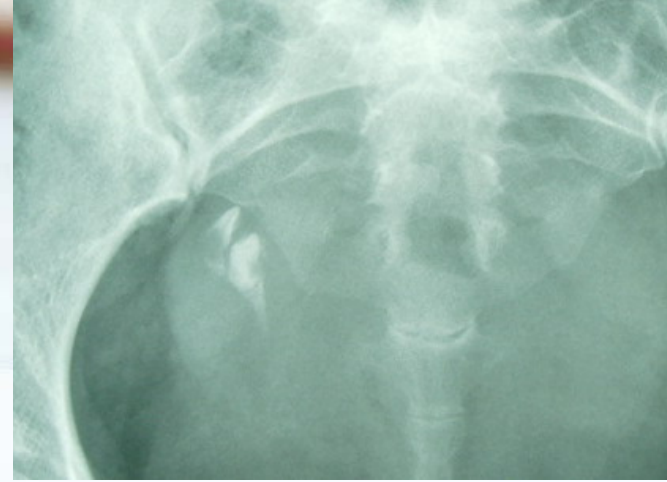








## Case 2



1. What is the AXR abnormality ? (1 mark)

A: Two tooth-like radio-opacities over right pelvic region

2. What is your provisional diagnosis ? (1 mark)

A: Right teratoma

## Case 2

3. What other sites can this condition occur ?  
(3 marks)

A: Mediastinum

Brain

Sacrococcyx

Sexual organs (ovary / testis)

Retroperitoneum

## Case 2

4. Name 3 complications that may occur in this patient. (3 marks)

A: Torsion (3.2-16%)  
Rupture (1-4%)  
Hemolytic anemia  
Malignant degeneration (0.1-2%)



## Case 3

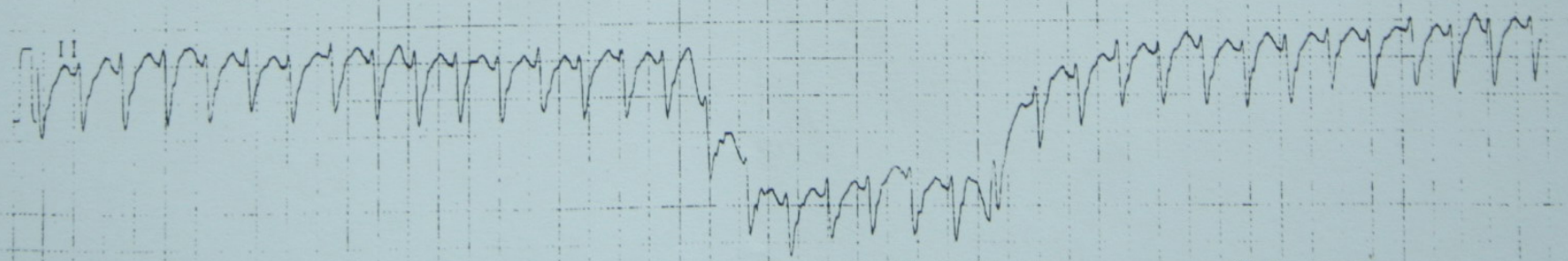
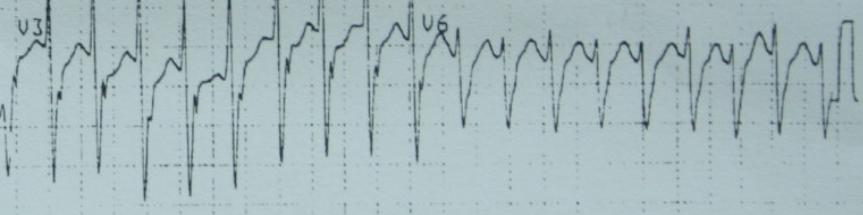
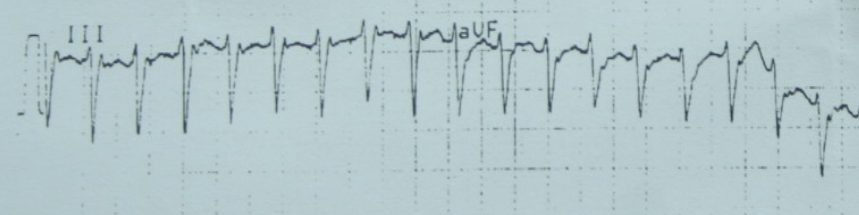
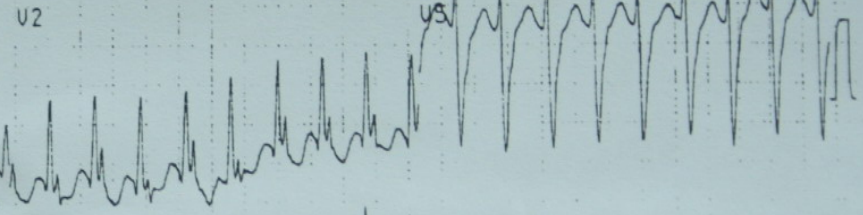
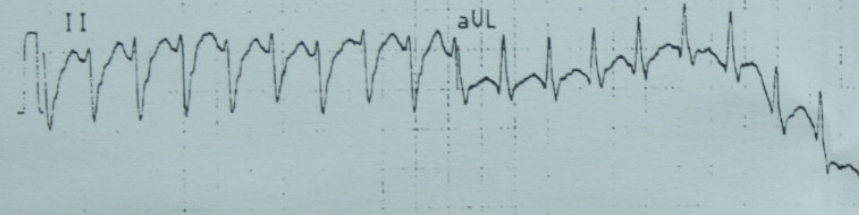
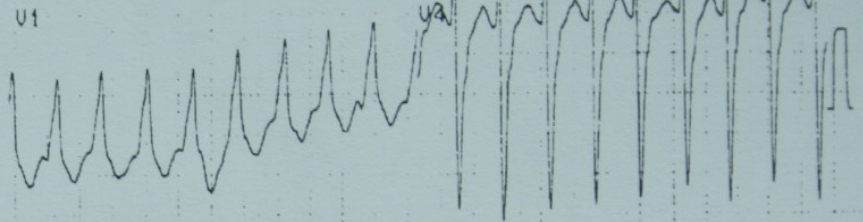
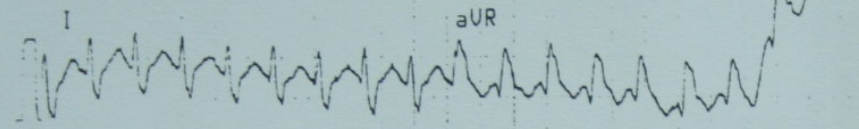
- A 23 year-old man had chest discomfort since yesterday. He did not have associated symptoms.
- BP 116/61, pulse 217/min
- SpO<sub>2</sub> 100%, RR 18/min
- ECG was done.

21/01/2007

19:55 EP1

10 mm/mV

10 mm/mV



25 mm/s

P 25 75 42 550 21-104-01 20-02:47

AT 2 3.83

## Case 3

1. What are the ECG findings ? (3 marks)

A: Tachycardia with rate 210/min  
RBBB with QRS width about 120 msec  
Left axis deviation

2. What is your diagnosis ? (2 marks)

A: Fascicular ventricular tachycardia

## Case 3

3. Name one drug that is specifically useful for this condition. (2 marks)

A: Verapamil



# Fascicular VT

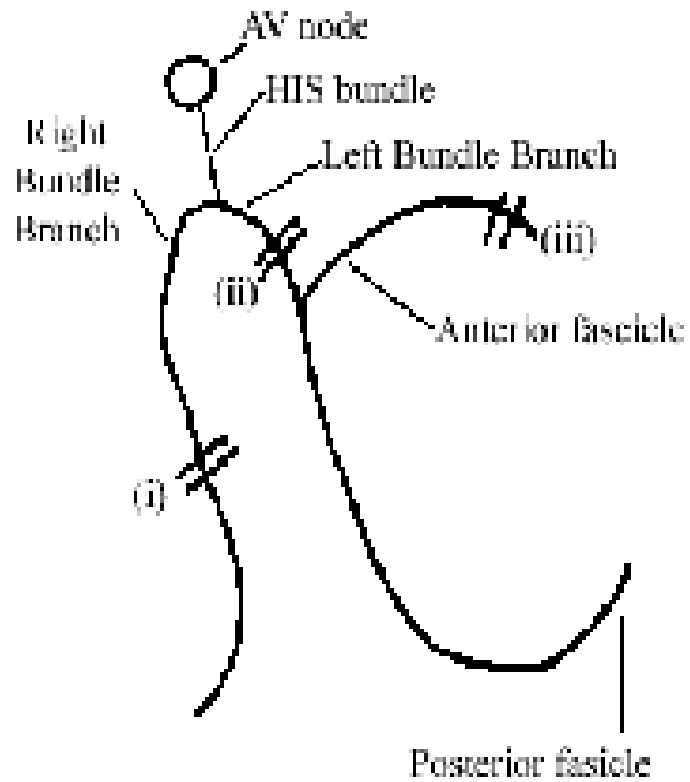
Ventricular tachycardia with narrow QRS complexes (left posterior fascicular tachycardia).

Cohen HC, Gozo EG Jr, Pick A. *Circulation*. 1972;45:1035–1043.

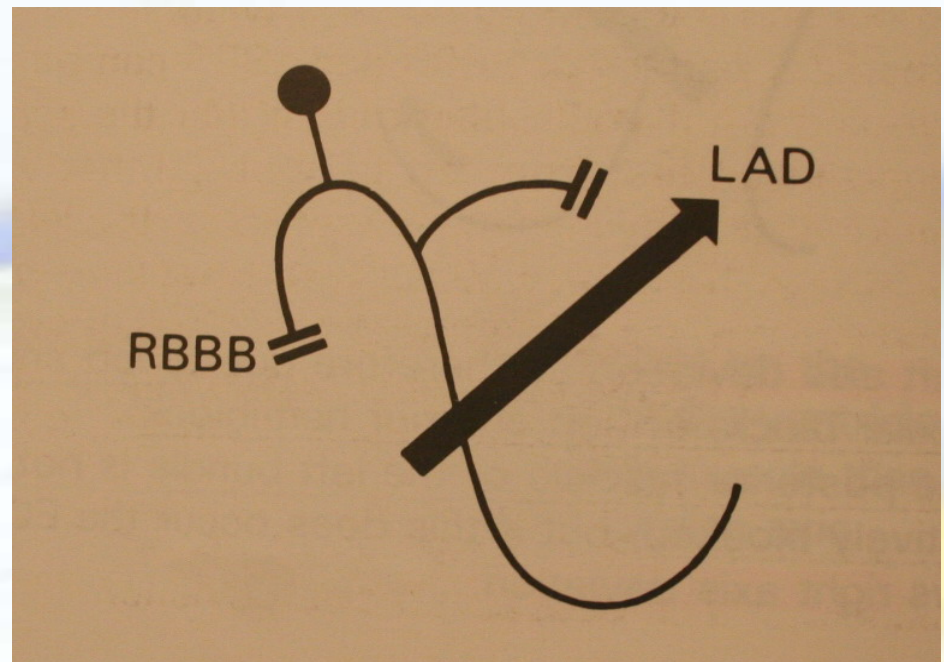
- First described by Cohen in 1972 <sup>(1)</sup>
- A distinct subgroup of idiopathic VT
- Easily confused with SVT with aberrant conduction & VT
- Also called **ILVT** (Idiopathic Left Ventricular Tachycardia)

# Fascicular VT

- Relatively narrow QRS 120-140 ms
- RBBB
- Re-entry / triggered automaticity
- **3 subtypes:**
  1. Left posterior fascicular VT (LAD) - common
  2. Left anterior fascicular VT (RAD) - uncommon
  3. Upper septal fascicular VT (normal axis) -rare



**Fig 21**



Left posterior fascicular VT (LAD)

# Fascicular VT vs VT

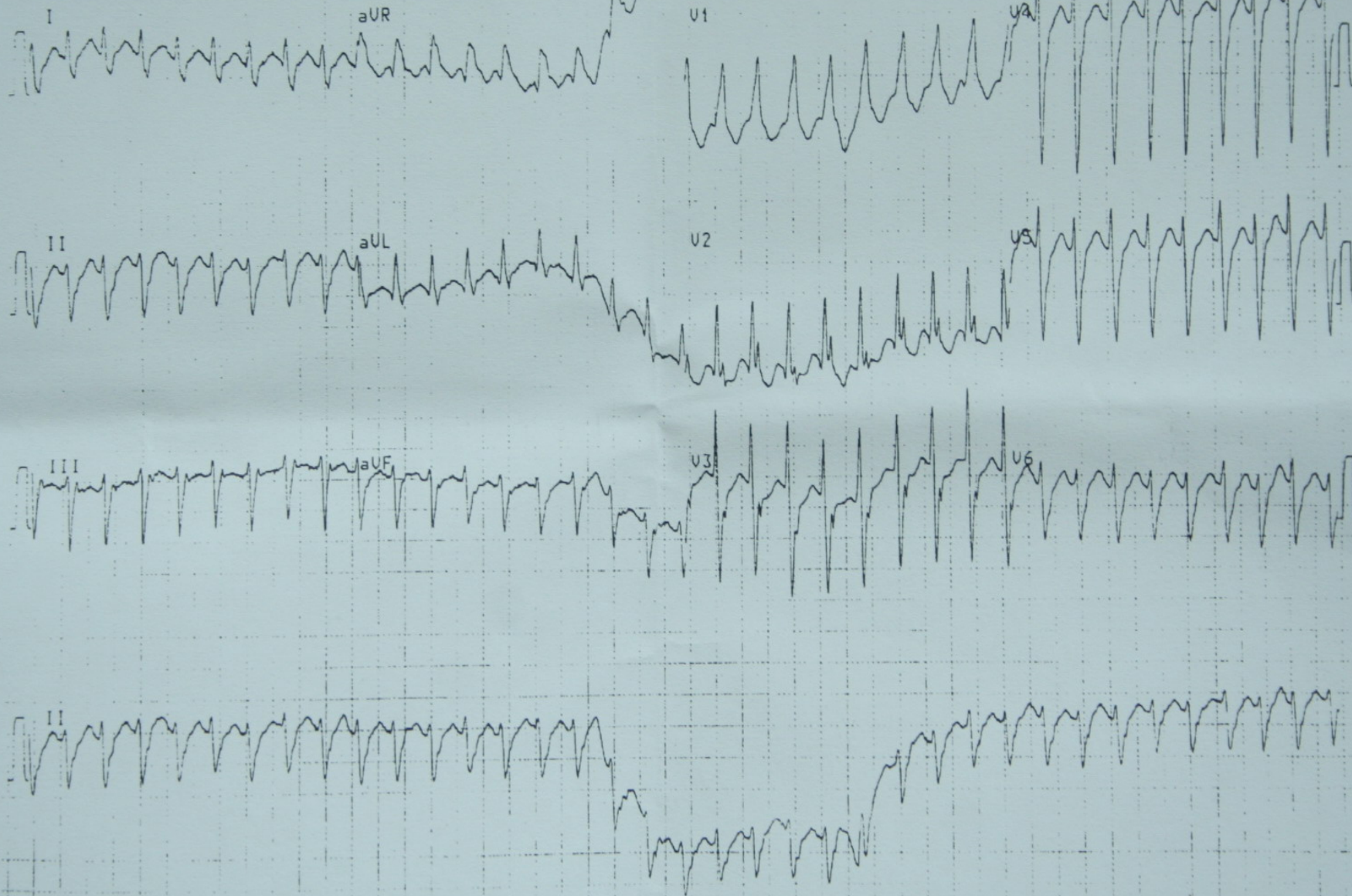
- Structurally normal heart
- **Not** response to adenosine
- IV verapamil effective
- Radiofrequency ablation (90% cure rate)
- **Prolonged** -> reversible tachycardia-induced cardiomyopathy
- Sudden cardiac death **unusual**



21/01/2007 1955 EP1

10 mm/mV

10 mm/mV



75 mm/s

8.25 75 42 752 21-104-22 20-02-17

AT 2 7.23

## Case 4

- A 22 year-old man had cough for 2 months. A CXR was taken & shown.







## Case 4



1. What are your findings ? (2 marks)

A: Situs inversus (NOT only dextrocardia)  
Bronchiectic changes (tram-lines) over left middle zone

2. What is your diagnosis ? (2 marks)

A: Kartagener syndrome



## Case 4

3. How is it inherited ? (1 mark)

A: Autosomal recessive

4. What is the pathophysiology of this condition ?  
(1 mark)

A: Primary ciliary dyskinesia PCD (not immobility  
as previously thought)

## Case 4

5. Name 3 complications for this condition.  
(3 marks)

A: Chronic sinusitis  
Bronchiectasis  
Infertility (M & F)

## Case 5

- A 25 year-old man was hit by others with fist resulting in right facial injury. This is the photo.



## Case 5



1. What physical signs can be seen in this photo ? (3 marks)

A: Impaired upward gaze on right side  
Right periorbital bruise  
Right subconjunctival haemorrhage

2. What is your clinical diagnosis ? (2 marks)

A: Fracture of right infraorbital floor with entrapment of inferior rectus muscle



## Case 5



3. What other physical signs will you look for ?  
(3 marks)

A: Loss of infraorbital sensation

Rupture globe of right eye

Other signs of basal skull fracture

(Subcutaneous emphysema - not so important as the others -> not affect management)

## Case 5

4. What is your management in A&E ? (4 marks)

A: Right eye shield

Prophylactic antibiotics (e.g. Augmentin) & analgesic

Radiology to confirm diagnosis (x-ray or CT Scan Orbit)

Consult ophthalmology for decompression of entrapped inferior rectus muscle

A yellow pencil with a sharpened lead tip lies diagonally across the bottom of the frame. It rests on a stack of white papers with faint blue horizontal lines. The background is softly blurred, showing more of the same papers and a hint of a blue object at the top.

Thank you !

Any Questions ?

# References

1. Cohen HC, Gozo EG Jr, Pick A. Ventricular tachycardia with narrow QRS complexes (left posterior fascicular tachycardia). *Circulation*. 1972;45:1035-1043.
2. <http://www.pubmedcentral.nih.gov/articlerender.fcgi?artid=1501077>
3. Emergency Diagnostic Test Manual - HKSEMS p.18.
4. [www.templejc.edu/dept/ems/documents/Presentations/2ndSemesterParamedic/Cardiology/WCTDifferential.ppt](http://www.templejc.edu/dept/ems/documents/Presentations/2ndSemesterParamedic/Cardiology/WCTDifferential.ppt)