# Physical Exam. - CVS2 "The precordium"

## 1) Introduction:

- Introduce yourself
- Take permission
- Request a chaperone
- Check the environment (temperature and lighting)
- Ensure privacy
- Perform <u>hand hygiene</u>
- Explain the physical examination to the patient
- Exposure: Upper body (above the waist)
- Position: 45°
- Ensure the patient is alert, conscious, and oriented (to place, person, and time)
- 2) General Inspection...
- 3) Vital Signs...
- 4) Face neck" JVP"- hands & nails "pulses"...

As previously mentioned, ...

# The precordium

## 1) Inspection

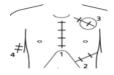
#### A) From the foot of the bed:

- Observe the breathing pattern: thoracoabdominal or abdominothoracic.
- Symmetrical bilateral chest movement with respiration.
- No chest deformities (e.g., pectus carinatum, pectus excavatum).
- No use of accessory muscles.

#### B) From the right side of the patient:

"Don't forget to ask the patient to extend their arms so you can inspect the axillary areas, and comment that there are no obvious scars or lumps."

- Normal hair distribution.
- No skin lesions.
- No scars or bulges (look for:
  - Midline sternotomy scar may indicate CABG or aortic valve replacement.
  - Left submammary scar may indicate mitral valvotomy.
  - Infraclavicular scar may indicate implanted devices like pacemakers or ICDs.
- No dilated veins.
- No visible apex beat pulsation (you may use a <u>torch</u> and lean at the level of the bed to observe it).



## 2) Palpation

- Make eye contact.
- Ask about painful areas. ?
- Warm your hands.
- Take permission.

#### A) Superficial palpation:

- No subcutaneous emphysema, masses, or tenderness.
- Ask the patient to raise their arms to inspect the <u>axillae</u> <u>no scars or palpable masses</u>.

#### B) Apex beat:

- Normal position: 5th intercostal space (ICS), midclavicular line, on the left side.
- Localize it with two fingers and roll the patient to the <u>left</u> while <u>maintaining finger contact with</u> the beat.
- Character: gentle tapping

#### C) Heaves:

- Palpate using the **Heel** of your right hand over the following areas:
  - 1. Left lower parasternal area (during breath-holding in expiration)  $\rightarrow$  for right ventricular hypertrophy.
    - 2. Right parasternal area.
    - 3. Apex  $\rightarrow$  for left ventricular hypertrophy.
- No heaves.



#### D) Thrills:

- Palpate using **fingers** over the five key areas:
  - 1. Apex.
  - 2. Left parasternal area.
  - 3. Right parasternal area.
  - 4. Left 2nd ICS.
  - 5. Right 2nd ICS.
- No thrills (No palpable murmurs).

#### 3) Auscultation

• Keep your fingers on the <u>carotid artery</u> while auscultating.

### A) Using the diaphragm of the stethoscope:

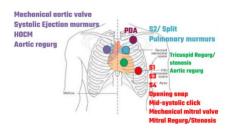
- Auscultate the **four** main areas:
  - Aortic: right 2nd ICS.
  - Pulmonary: left 2nd ICS.
  - Tricuspid: left lower sternal border.
  - Mitral: apex.

#### \* Radiation:

- 1. Carotids (while holding breath) → for radiation of aortic stenosis murmur.
- 2. Left axilla  $\rightarrow$  for mitral regurgitation.
- 3. <u>Sit</u> the patient up and have them <u>lean forward</u>, <u>hold their breath in expiration</u>, and listen with the diaphragm over:
  - Aortic area (right 2nd ICS).
  - Erb's area (left sternal border, 3rd ICS)
  - → for murmur of aortic regurgitation.

#### **B)** Using the **bell** of the stethoscope:

- At the apex (after <u>rolling</u> the patient to the left side)  $\rightarrow$  for <u>mitral stenosis</u>, S3 & S4.
- At the lower left sternal border → for tricuspid stenosis.



#### **Findings:**

- Normal S1 & S2.
- Normal physiological splitting of S2 during inspiration.
- No S3 or S4.
- No added sounds (e.g., opening snap, ejection click, friction rub...).
- No murmurs (if present, comment on <u>location</u>, <u>radiation</u>, <u>timing</u>, <u>character</u>, and <u>pitch</u>).

# Finally, I would also examine:

- Lower limb edem
- Sacral edem
- Hepatomegaly
- Ascite
- Lung bases (auscultation for crackles)
- Signs of Deep Vein Thrombosis (DVT)
- I'll examine for ulcers, peripheral pulses, and jugular venous pressure (JVP).

# Don't forget to thank the patient at the end.



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