

## Curation of a patient with acute coronary syndrome

A 37-year-old woman complains of constricting retrosternal pain that occurs every day at the same time in the morning. The pain occurs in the absence of provoking factors. Holter monitoring data show ST segment elevation in leads V1-V3 during a pain attack. Without pain syndrome, there are no pathological changes on the ECG. What is the most likely diagnosis in this case?

- a. First episode of angina pectoris
- b. Prinzmetal angina pectoris**
- c. Exertional angina pectoris, functional class III
- d. Unstable angina pectoris
- e. Progressive angina pectoris

For the last 3 months, a 68-year-old woman has been suffering from pain attacks in the heart that last for 10 minutes. The pain attacks occur in response to the slightest physical exertion. She does not take nitroglycerin because of severe headache. She was repeatedly treated for ischemic heart disease and had a myocardial infarction. Her blood pressure periodically rises to 160/80 mm Hg. ECG shows cicatricial changes in the posterior wall of the left ventricle. Auscultation reveals a systolic murmur over the aorta. What is the most likely diagnosis in this case?

- a. Recurrent myocardial infarction
- b. Aortic aneurysm with aortic dissection
- c. Unstable angina pectoris
- d. Stable exertional angina pectoris, FC II
- e. Stable exertional angina pectoris, FC IV**

A 45-year-old man complains of an intense retrosternal pain that radiates into the lower jaw and occurs at rest, at night, several times for 10-15 minutes. During a pain attack, an elevation of the ST segment can be recorded on the ECG in leads V 3-4. What is the provisional diagnosis in this case?

- a. Prinzmetal angina pectoris**
- b. Progressive angina pectoris
- c. Stable angina pectoris, functional class IV
- d. Myocardial infarction
- e. Stable angina pectoris, functional class II

A 55-year-old man on the 3rd day after an acute anterior myocardial infarction complains of shortness of breath and a dull pain behind the sternum that decreases when he leans forward. Objectively, his blood pressure is 140/80 mm Hg and his heart sounds are muffled. ECG shows atrial fibrillation with the ventricular rate of 110/min., pathological Q wave, and ST segment elevation in the right-sided chest leads. Make the diagnosis:

a. Dressler syndrome

**b. *Acute pericarditis***

c. Tietze syndrome

d. Dissecting aortic aneurysm

e. Pulmonary embolism

Four weeks after a myocardial infarction, a 52-year-old man developed an elevated body temperature and pain in the area of his heart, behind the sternum, and in the sides of his torso. The pain intensifies during breathing. A few days later, the patient developed arthralgias as well. Examination reveals pericarditis, pleurisy, and arthritis. Blood test shows leukocytosis and increased ESR. ECG revealed concordant elevation of the ST segment in standard leads. What is the most likely diagnosis in this case?

**a. *Dressler's syndrome***

b. Recurrent myocardial infarction

c. Pulmonary thromboembolism

d. Acute myocarditis

e. Sjogren's syndrome

A man was undergoing treatment for a myocardial infarction. On day 13, his chest pain increased and he developed shortness of breath. Objectively, the following is observed: temperature -  $38.2^{\circ}\text{C}$ , pulse - 112/min., respiration rate - 26/min., fine bubbling crackles can be heard under the right shoulder blade. On day 15, he was diagnosed with right-sided exudative pleurisy. Complete blood count shows the following: leukocytes -  $8.9 \cdot 10^9/\text{L}$ , eosinophils - 8 %. ESR - 24 mm/hour. What complication of myocardial infarction occurred in this patient?

a. Cardiac asthma

b. Pneumonia

***c. Dressler syndrome***

- d. Recurrent myocardial infarction
- e. Pulmonary embolism

A 42-year-old man was hospitalized with complaints of shortness of breath, weakness, and constricting and burning chest pain that radiates into the left shoulder and left scapula. The pain syndrome occurred for the first time in his life after emotional and physical stress and lasts approximately 2 hours already; it slightly decreased, but did not disappear even after repeated sublingual administration of nitroglycerin and aspirin in the dose of 325 mg. Provisional diagnosis: acute coronary syndrome without ST elevation. Objectively, blood pressure - 110/70 mm Hg, pulse - 98/min., rhythmic. Heart sounds are weakened, no murmurs. ECG shows ST segment depression and a negative T wave in leads I, aVL, V3-V6. What is the most likely diagnosis in this case?

- a. First episode of angina pectoris
- b. Non-Q-wave inferior myocardial infarction
- c. Unstable angina pectoris
- d. Acute coronary syndrome with ST elevation

***e. Non-Q-wave anterolateral myocardial infarction***

A 54-year-old man was brought to a hospital with complaints of a sudden sharp pain in his chest that appeared when he was lifting a heavy object. The pain is localized in the center of his chest. It does not irradiate to other areas, nor does it intensify with changes in the position of the body. The pain is accompanied by nausea without vomiting. No respiratory symptoms are observed. The man has a history of essential hypertension and takes angiotensin-converting-enzyme inhibitors. Objectively, his skin is pale and moist. His pulse is 115/min., respiratory rate - 20/min. ECG shows sinus tachycardia. Chest X-ray shows a darkening in the upper left and lower right segments. His cardiac enzyme levels are normal. Make the diagnosis:

- a. Strangulated hiatal hernia
- b. Dissecting aortic aneurysm***
- c. Acute myocardial infarction
- d. Myocarditis
- e. Acute pericarditis

A 62-year-old patient has been hospitalized with complaints of intense retrosternal pain that lasts for one hour already and cannot be relieved with nitroglycerin. The patient suffers from angina pectoris, previously the attacks could be relieved with nitrates. The patient has no other diseases. Objectively, cyanosis of the lips is observed. Heart sounds are dull and rhythmic. ECG shows elevation of ST segment in leads V4-V6. What drug must be immediately administered to the patient?

a. Corglycon

**b. Actilyze (Alteplase)**

c. No-spa (Drotaverine)

d. Dimedrol (Diphenhydramine)

e. Analgin (Metamizole sodium)

A 58-year-old patient was delivered to an admission room with complaints of pain in the thorax on the left. On clinical examination: aside from tachycardia (102/min.) no other changes. On ECG: pathologic wave Q in I, aVL, QS in V1, V2, V3 leads and 'domed' ST elevation with negative T. What diagnosis is most likely?

a. Acute left ventricular anterior myocardial infarction

b. Aortic dissection

c. Variant angina pectoris

**d. Acute left ventricular posterior myocardial infarction**

e. Exudative pericarditis



