

• 临床病理讨论 •

Clinicopathological Conference

An 87-year-old female patient with persistent chest-abdominal pain and anorexia

(The 23rd case)

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Case presentation

The patient, an 87-year-old female, was admitted to the hospital on Feb 28, 2007 because of paroxysmal chest pain and short breath for 3 years, which were aggravated and accompanied by persistent chest-abdominal pain and anorexia for 1 week before admission.

The patient had been admitted to the respiratory department of this hospital on May 25, 2004 because of chest distress and short breath without cough, expectoration or blood tinged sputum, treated as pleural effusion and discharged after improvement. On June 22, 2004, the patient got severe precordial pain lasting several hours accompanied by sweating and dyspnea without radiating pain, nausea and vomiting. She sought medical advice at the cardiac emergency room of this hospital and was admitted as 'acute non-ST-segment elevation myocardial infarction'. She received treatment of coronary dilatation and anticoagulation and discharged after the symptoms were relieved. One week before admission, the patient felt decrease in appetite, apparent nausea after getting angry, but there was no obvious dysphagia. She drunk only a little amount of soup every day. The chest-abdominal pain appeared and was aggravated gradually. After cessation of solid food intake for 5 days, she was admitted to our department on Feb

28, 2007.

Physical examination : the temperature was 36.5°C, pulse 90 bpm, respiration 20/min, and BP 140/70 mmHg. The patient was fully conscious and emaciated. No cyanosis was found. The respiratory sounds were clear and a small amount of moist rales were heard at the bottoms of both lungs. The precordial area was not elevated and the cardiac boundary was expanded. The heart rate was 90 bpm. Cardiac rhythm was regular and a grade 2/6 systolic murmur was heard at the auscultation area of aortic valve. No pathologic murmur was heard at other auscultation areas. The abdomen was flat, soft and had mild tenderness. A rope like mass was touched at the midline area of abdomen, the bowel sound was weak. The systolic blowing murmur was quite clear at the area of carotid artery, abdominal aorta and inguinal area. The pulsation of arteries was hardly felt at both lower extremities which had mild edema.

ECG revealed sinus rhythm, ST segment depression 0.2-0.4 mV in leads V_2 - V_6 . Myocardial enzymes: CK 50U/L, cTnT<0.01 μ g/L.

After admission, the patient received drugs for coronary dilation, antiplatelet treatment and nutritional support. CT imaging demonstrated the following changes : (1) atherosclerosis of aorta, superior mesenteric artery, renal artery and iliac arteries. (2) thickening of lower esophageal wall, mediastinal lymph nodes enlargement. (3) multiple metastatic tumors in liver. (4) small amount of effusion in left pleural cavity. Because of the pa-

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tient's poor condition, it was not allowed to perform endoscopic examination of the digestive tract to determine the nature of the tumor in order to treat it. Further examination of tumor biomarkers found elevation of NSE, CA₁₉₋₉ and CEA. Since the dissection of aorta was excluded, the patient received combine therapy with LMWH, anti-platelet drugs, metoprolol, cardoverine, nitrates and intravenous nutrient fluid. The symptoms of the patient were obviously relieved after 2-week treatment. On March 16, 2007, the patient felt nausea after lunch, and vomited about 50ml of coffee-like liquid, which revealed digested blood. Then the therapy of LMWH was ceased. An traditional Chinese medicine 'Yun Nan Bai Yao', proton pump inhibitor, compound glutamine granules were given to control digestive tract bleeding. Three days later, the patient complained of a sudden onset of chest pain and dyspnea. An emergency ECG showed novel ST segment depression in lead II, III, avF and V₁. Myocardial enzymes: CK-MB 253U/L, cTnT 2.52μg/L. Physical examination showed BP 120/70 mmHg, moist rales at bottoms of both lungs, HR 110 bpm. S₄ and grade 2/6 SM at aortic auscultation area were heard. The diagnosis of acute non ST-segment elevating myocardial infarction was established. Although occult blood test for gastric drainage was still positive, the therapy of LMWH was adopted again. Relatives of the patient refused all invasive procedure and treatment on their own expense. The patient was given a combination therapy of oxygen, LMWH, anti-platelet drugs, metoprolol, cardoverine, nitrates, morphine and intravenous nutrient fluid, but the myocardial enzymes were elevated with time. On March 21, the patient's blood pressure fell to below 100/60 mmHg. The intravenous drip of metoprolol was withdrawn and intravenous dopamine was given. At 12:48 her heart rate fell to below 30 bpm and spontaneous breath disappeared. Since relatives of the patient refused to give permission of CPR, intravenous push of dopamine, epinephrine, coramine, atropine and sodium bicarbonate failed to restore her heart rate and spontaneous

breath. The time of death was 14:25.

Clinical discussion

Dr. Gao Wei (attending doctor of CCU in IGC): The patient is an octogenarian female, who had persisting chest-abdominal pain after admission. The ECG monitoring showed multiple changes of ST segment and T wave in almost every lead. The pain was refractory to nitrates. CT scan excluded aortic dissection but revealed multiple vascular stenosis and metastatic tumor in liver. We believe that there were two more reasons accounting for the pain other than cardiac ischemia. They were digestive tract cancer and superior mesenteric artery stenosis. So the patient were stabilized after giving combined therapy of LMWH, anti-platelet drugs, metoprolol, cardoverine, nitrates and intravenous nutrient fluid. But the tumor-related digestive tract bleeding broke the balance between treatment and coagulation system. After cessation of LMWH, a large area of myocardial infarction was developed. Considering the presence of digestive tract bleeding, there was contradiction in anticoagulative treatment. The relatives of patient gave no consent of invasive treatment. There were no effective methods to completely improve cardiac ischemia. The patient finally died because of cardiogenic shock and dyscrasia.

Dr. Tian Jinwen (attending doctor of Ward-I in IGC): According to the symptoms (chest abdominal pain, anorexia), physical signs and CT scan results (thickening of lower part of esophageal wall, mediastinal lymph node enlargement and multiple metastatic tumors in the liver), I think the origin of cancer was in esophagus. The obvious myocardial ischemia and multiple arterial stenoses were contraindication of endoscope examination of upper gastrointestinal tract. The treatments of active gastrointestinal tract bleeding and acute coronary syndrome were also contradictory. The patient had advanced malignant tumor, her relatives refused interventional therapy and drug treatment could not control ischemia, resulting in extensive myocardial infarction and final death.

Dr. Lu Caiyi (director of IGC): The patient had two symptoms on admission: chest-abdominal pain and dysphagia. The diagnoses of upper digestive tract cancer, systemic atherosclerotic stenosis and unstable angina were confirmed after taking CT scan and consultation. We could not give the patient an endoscope examination to make sure of the origin and pathologic subtype of the cancer due to refractory cardiac and intestinal ischemia. The chemical and radiation therapies also could not be applied considering concomitance dyscrasia. In this case, the interventional coronary therapy (PTCA, stent implanting, IABP) was also not an option for cardiac ischemia because of lacking routine intervention pathway due to systemic atherosclerotic stenosis. The patient had systemic atherosclerotic stenosis and symptoms of severe ischemia of various systems, her organs could not support a coronary intervention. Furthermore her coronary artery had diffused stenosis, coronary intervention might not be able to alleviate cardiac ischemia. In addition, the patient had an end-stage cancer with systemic metastasis, a very high risk emergency PCI might not be cost-effective. According to the considerations listed above, the patient was not a suitable candidate for emergency PCI. We should pay more attention on regulating anti-coagulation and anti-platelet therapy in case of cardiac ischemia

accompanied by GI bleeding.

Pathological diagnosis

The main autopsy diagnosis: atherosclerosis, coronary atherosclerotic heart disease, acute myocardial infarction involving anterior, posterior, lateral and inferior walls of left ventricle, interventricular septum, as well as right ventricle. There were also many old infarction foci in the areas mentioned above. The stenosis degrees at proximal, middle and distal part of left anterior descending artery were 80%—90%, 60%—80% and 50%—70% respectively. The lumen loss of middle and distal part of left circumflex artery were 80% and 30%—50% respectively. The stenosis degrees of proximal, middle and distal part of right coronary artery were 90%, 60—80% and 50—70% respectively. The aortic atherosclerosis lesion was grade IV compound lesion. The atherosclerotic lesions of abdominal aorta superior mesenteric artery, iliac arteries and renal arteries were grade II—III. Bilateral lung edema and hydrothorax: 180ml in right and 300 ml in left. Poorly differentiated adenocarcinoma was found at lower part of esophagus. Metastatic carcinomas at the 12th thoracic vertebra and liver, cancer emboli were found in lymphoduct and lymphonodes of mediastinum.

(Translator: XU Qiang)

87 岁女性持续性胸腹痛伴纳差患者 1 例

1 病例摘要

患者,女性,87 岁,主因“发作性胸闷痛、气短 2 年余,持续性胸腹部疼痛伴纳差 1 周于 2007 年 2 月 28 日入院。

2004 年 5 月 25 日患者无诱因出现胸闷、气短,无咳嗽、咳痰,无痰中带血,无发冷发热及盗汗,以“胸腔积液”收住解放军总医院呼吸科,治疗好转出院。2004 年 6 月 22 日晚 22:00 患者无明显诱因出现心前区疼痛,伴大汗、呼吸困难,无放射痛,无恶心呕吐,就诊于解放军总医院急诊,以“急性非 ST 段抬高性心肌梗死”收入院,给予扩冠、抗凝等治疗,病情好转后

出院。出院后患者继续口服药物维持,间断于劳累后胸痛气短,未再次入院诊治。入院前 1 周,患者生气后自觉食欲减退,恶心明显,渐不能进食,仅能少量饮水,且逐渐出现胸部及全腹疼痛,程度逐渐加重,连续 5d 无进食,急诊收入解放军总医院老年心血管病研究所。

查体:体温:36.5℃,脉搏:90 次/min,呼吸:20 次/min,血压:140/70 mmHg。无紫绀,双下肺可闻及少量湿性啰音。心前区无隆起,心界大,心率 90 次/min,律齐,主动脉瓣听诊区 2/6SM,其余各瓣膜听诊区未闻及病理性杂音。腹部平软,全腹轻压痛,腹部中线部位可触及纵行条索样肿物,肠鸣音较弱,2~3 次/min,颈动脉区、腹主动脉区、腹股沟区可闻及收

缩期吹风样杂音。双下肢动脉搏动弱。双下肢轻度浮肿。

心电图示: V_2-V_6 导联压低 0.2~0.4mV。急诊生化: cTnT < 0.010 μ g/L, CK 50U/L。

入院后给予扩冠、抗血小板、营养支持等治疗。CT 结果考虑: (1) 主动脉粥样硬化, 累及主动脉、肠系膜上动脉、肾动脉、髂动脉; (2) 食管壁厚, 纵隔淋巴结肿大; (3) 肝脏多发转移瘤; (4) 左侧少量胸腔积液。因患者基础状况不允许, 未能进一步检查消化道内镜以明确肿瘤部位性质, 给予肿瘤专科治疗。进一步的肿瘤标记物检查显示 NSE、CA₁₉₉、CEA 升高。由于 CT 检查排除了夹层, 笔者对患者进行了低分子肝素、强化抗血小板药物、美托洛尔、罂粟碱、硝酸酯以及静脉营养为主的综合治疗。经过两周的治疗, 患者症状明显改善。于 2007 年 3 月 16 日, 患者午餐后突发恶心并呕出 50ml 咖啡色液体。随之低分子肝素治疗停止。并给予中药“云南白药”, 质子泵抑制剂、麦滋林颗粒以控制消化道出血。3d 后患者诉突发胸痛伴呼吸困难, 急查心电图显示 II、III、aVF、V₁ 导联新发 ST 段压低。心肌酶: CK-MB 253U/L, 肌钙蛋白 2.52 μ g/L, 查体发现: 血压 120/70 mmHg, 双下肺湿啰音, 心率 110 次/min, 可闻及第四心音, 主动脉瓣听诊区 2/6 级杂音。因此确诊急性非 ST 段抬高性心肌梗死。虽然患者引流胃液潜血检验仍为阳性, 笔者仍然再次给予患者低分子肝素治疗。患者亲属拒绝了所有侵入性治疗方法及自费治疗方案。患者再次接受了吸氧、强化抗血小板药物、美托洛尔、罂粟碱、硝酸酯、吗啡、以及静脉营养为主的综合治疗方案。但是心肌酶仍逐渐升高, 2007 年 3 月 21 日晨, 患者血压开始下降至 100/60 mmHg, 停用静脉美托洛尔, 加用多巴胺泵入。12:48 患者心率逐渐下降至 30 次/min 以下, 且自主呼吸消失, 由于患者家属不同意心肺复苏, 先后反复静脉使用多巴胺、肾上腺素、可拉明、阿托品、碳酸氢钠等药物均未能恢复患者窦性心律及自主呼吸。于 14:25 宣布临床死亡。

2 临床死亡讨论

高伟副主任医师: 患者高龄女性, 入院后持续胸腹部疼痛, 心电监护显示多发 ST-T 改变。给予硝酸甘油治疗效果差, 行 CT 检查排除夹层, 但提示多发动脉硬化狭窄, 肝脏转移性肿瘤可能。相信除了心肌缺血外, 还有两个原因, 消化道肿瘤和肠系膜上动脉狭窄, 导致了患者胸腹部疼痛。所以给予患者低分子肝素、强化抗血小板药物、美托洛尔、罂粟碱、硝酸酯以及静脉营养为主的综合治疗, 患者病情逐渐稳定。但是由于消化道肿瘤引起的出血破坏了综合治疗及机体凝血系统之间的平衡。低分子肝素治疗停止后,

患者发生了大面积心肌梗死, 药物治疗有矛盾。而且患者家属不同意侵入性治疗措施, 由于没有有效改善患者心肌缺血的措施, 患者最终死于心源性休克及恶液质。

田进文副主任医师: 结合患者症状(胸腹痛、纳差), 体征及 CT 显示食道增厚、纵隔淋巴结肿大、吞咽困难, 多发肝脏转移瘤, 综合考虑食道癌可能性较大, 该患者存在明显心肌缺血及多发动脉狭窄, 是消化道内镜的禁忌症, 治疗上存在矛盾, 患者恶性肿瘤晚期, 家属不同意介入治疗, 药物治疗无法控制缺血, 最终大面积心肌梗死而死亡。

卢才义主任医师: 关于该患者, 入院时存在两个问题: 胸腹痛、进食困难, 经过及时检查、会诊后, 确定了消化道肿瘤、全身性动脉粥样硬化狭窄、不稳定型心绞痛的诊断, 由于患者存在难治性心肌缺血及肠道缺血, 无法对患者进行内镜检查以明确肿瘤的部位及病理分型。患者明显的恶液质也无法接受针对肿瘤的放、化疗。对本病例来说, 冠心病的介入治疗措施(PTCA、支架、IABP)也不可取, 首先由于系统性动脉粥样硬化狭窄缺少介入手术的常规入路, 其次患者存在系统性动脉粥样硬化, 全身各系统严重缺血, 其器官功能也不足以支持冠脉介入, 另外患者冠脉可能存在严重弥漫型狭窄, 介入手术可能无法达到改善心肌缺血的目的。而且患者存在晚期肿瘤全身转移, 极度高危的冠脉介入手术花费多而临床效果差。鉴于以上原因, 该病人不适于进行急诊冠脉介入。在今后的治疗中应将如何个体化确定高龄患者抗血小板、抗凝的强度作为临床研究的重点。

3 病理诊断

病理诊断: 动脉粥样硬化, 冠状动脉硬化性心脏病, 急性左室前壁侧壁后壁下壁心肌梗死, 急性间隔部心肌梗死, 急性右室心肌梗死, 陈旧性左室前壁侧壁后壁下壁心肌梗死, 陈旧性右室心肌梗死, 左前降支冠脉狭窄: 近段 80%~90%, 中段 60%~80%, 远段 50%~70%, 左旋支狭窄: 中段 80%, 远段 30%~50%, 右冠脉斑块狭窄: 近段 90%, 中段 60%~80%, 远段 50%~70%。主动脉粥样硬化病变 4 级, 复合病变期。腹主动脉、肠系膜上动脉、双侧髂动脉、肾动脉粥样硬化病变 2~3 级; 双侧肺水肿、胸腔积液: 左侧 300ml, 右侧 180ml。食管下段可见低分化腺癌, 侵及食管全层。T₁₂ 椎体及肝脏见多发转移灶, 纵隔内淋巴管及淋巴结内可见癌栓。

(参加讨论医师: 高伟、田进文、卢才义)

(许强 整理)