

UNEXPECTED CYTOLOGY IN A PERICARDIAL EFFUSION

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Category: Case Vignettes

Background: HHV8-negative effusion-based lymphoma (HNEBL) is an underrecognized entity. Diagnosis requires a high degree of clinical suspicion and careful cytopathologic analysis.

Case: An 80-year-old female with diabetes mellitus, CHF, and atrial fibrillation presented to the ED with one week of worsening dyspnea. She was tachycardic at 130 bpm with a BP of 100/70 mmHg. She had JVD, distant heart sounds, and bilateral lower extremity edema. CXR showed significant interval enlargement of her cardiac silhouette. ECG demonstrated atrial fibrillation and low QRS voltages. TTE revealed a large circumferential pericardial effusion with no evidence of diastolic collapse.

Decision Making: In the cardiac ICU she received intravenous fluids and dopamine with stabilization of her hemodynamics and IV diltiazem for rate control. A pericardiocentesis was performed yielding 700 mL of bloody fluid. Analysis of the fluid revealed the presence of large pleomorphic tumor cells. Both immunohistochemistry and FISH findings led to the diagnosis of HNEBL. A careful discussion of potential therapeutic options was carried out with the patient who opted for hospice care.

Conclusion: HNEBL is a rare hematolymphoid neoplasm presenting as body cavity effusions. It occurs in older populations with fluid overload states such as heart failure and kidney disease. Given the limited amount of reported cases, there is a lack of consensus with respect to treatment.

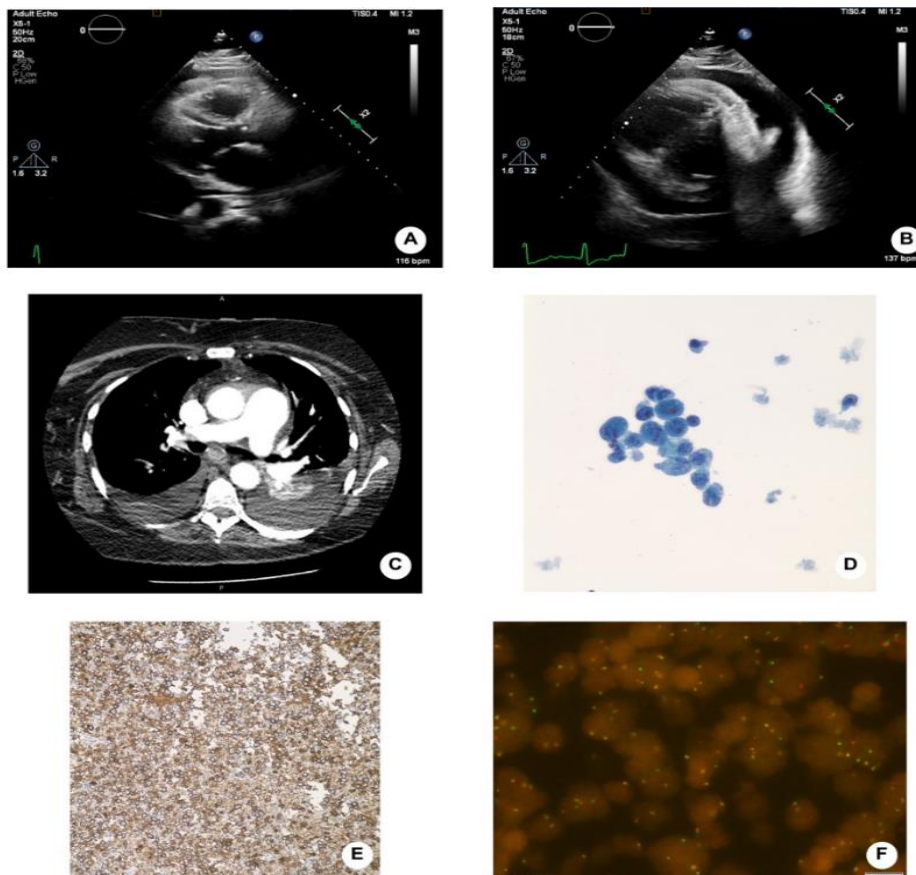


Figure Panel

A and B. TTE demonstrating significant pericardial effusion

C. Contrast CT chest revealing PE.

D. Thin-prep slide showing large pleomorphic tumor cells with prominent nucleoli.