CLINICAL CASE OF HYPEREOSINOPHILIA AS A CLINICAL PRESENTATION OF ANAPLASTIC LARGE CELL LYMPHOMA

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INTRODUCTION

Hypereosinophilia is more frequently observed in Hodgkin lymphoma. Among T-cell lymphomas, anaplastic large cell lymphoma (ALCL) is the subtype most commonly associated with eosinophilia. In cases presenting with hypereosinophilia, a stronger association has been noted with Ki-1 (CD30) expression. This condition is often accompanied by increased bone marrow cellularity, primarily of reactive origin. In some instances, hypereosinophilia is associated with overexpression of interleukins 3 and 5.[1,2]

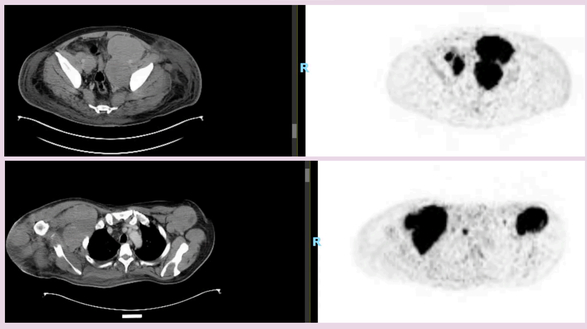
CLINICAL CASE:

A 48-year-old male with no significant past medical history presented with a cervical mass of six months' duration, characterized by progressive and rapid growth, accompanied by left arm swelling. A diagnostic workup was initiated. On admission, thrombosis of the right upper extremity was identified.

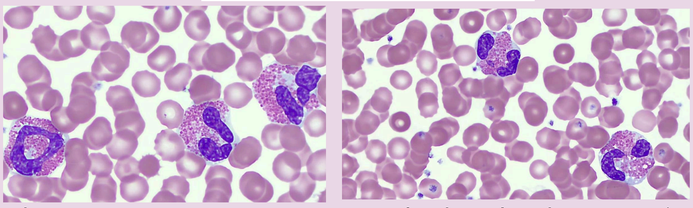


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PET CT



HYPERESINOPHILIA IN BONE MARROW



Laboratory tests revealed leukocytosis (26,400/µL) with marked eosinophilia (15,400/µL). Bone marrow biopsy showed 70% cellularity, a myeloid-to-erythroid ratio of 8:1, megaloblastic changes, and megakaryocytic dysplasia. Given the hypereosinophilia, cytogenetic analysis was performed and was negative for the FIP1L1–PDGFRA fusion gene. A lymph node biopsy confirmed the diagnosis of anaplastic large cell lymphoma (CD3+, CD4+, CD30+, ALK−), staged as Ann Arbor stage III based on PET/CT findings.

CONCLUSIONS

Hypereosinophilia is not a common initial manifestation in lymphoma patients, particularly in cases of anaplastic large cell lymphoma. When a lymphoproliferative neoplasm is suspected, it is crucial to conduct a comprehensive evaluation, including genetic screening, to rule out alternative pathologies and determine whether eosinophilia is part of the clinical presentation of the lymphoma or a concurrent condition.[1,2]

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