

A Patient with Ankles Edema

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Introduction

Bilateral ankles swelling is a common problem encountered in primary care. This abstract presents a patient with an uncommon cause.

The Case

A 63-year-old woman with hypertension on amlodipine 2.5mg daily and losartan 75mg daily attended a General Outpatient Clinic complained of progressive bilateral ankles edema for 6 months. She was otherwise asymptomatic. She was initially managed as calcium-channel-blocker-related ankles edema and the amlodipine was stopped. However, the swelling persisted even after 1 month of the regimen change. Her spot urine Protein/Creatinine ratio was 607mg/mmol Cr. Subsequent 24-hour urine showed she was losing 4.75g of protein per day. She was referred to the Renal specialist immediately.

Result

Renal biopsy was performed on the patient. Periodic Schiff-Methenamine (PASM) staining revealed the presence of epimembranous spikes with 'cock's comb' appearance suggestive of amyloidosis. Further workup showed skewed serum free Kappa/Lambda ratio of 0.02 with monoclonal IgA/Lambda detected. CA 125 was also elevated to 204U/mL (Ref:<35). With further investigations by Haematology, Cardiac, Neurology and Dental specialists, the patient was finally diagnosed to have AL (amyloid light chain) amyloidosis and she was started on chemotherapy.

Discussion

Amyloidosis is a generic term for extracellular tissue deposition of fibrils composed of low molecular weight subunits of a variety of proteins, many of which circulate as constituents of plasma. There are different forms of amyloidosis. In this patient, the AL amyloidosis affected the kidneys most which resulted in nephrotic syndrome. Treatment is aimed at the underlying plasma cell dyscrasia.

Conclusion

Family physicians should be aware of the possibility of this rare, sinister cause of lower limbs edema and initiate investigations timely.

Reference

Peter D Gorevic. Overview of amyloidosis [Internet]. UpToDate Topic 5589 Version 56.0 [Last updated 2025 Mar 31; cited 2025 Jun 17]. Available from: https://www.uptodate.com.eproxy.lib.hku.hk/contents/overview-of-amyloidosis?search=amyloidosis&source=search_result&selectedTitle=1~150&usage_type=default&display_rank=1

Keywords

Amyloidosis, Nephrotic syndrome, Bilateral ankles edema