

Multiple Myeloma with Hairy Cell-Like Plasma Cells

Yavaşođlu İ. et al.: MM with Hairy Projections

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It is a rare finding that plasma cells (PCs) exhibit different shapes and contain inclusions [1,2]. A 68-year-old woman was evaluated for lumbar pain. Anemia and lytic lesions were detected. She was diagnosed with immunoglobulin G-kappa Revised Multiple Myeloma International Staging System Stage-2 multiple myeloma (MM). Bone marrow aspirate showed plasma cells with diffuse, hairy cell-like cytoplasmic projections (Figure 1a, 1b, and 1c). These plasma cells were positive for Cluster of differentiation (CD) 38, CD138, kappa, and negative for FMC and CD11c. Annexin-5 and tartrate-resistant acid phosphatase stain were negative in immunohistochemistry. The minority of plasma cells that do not exhibit hairy projections are also presented for comparison (Figure 1d). In terms of the patient's cytogenetic findings, the conventional karyotyping result was 46XX, and there were no significant features in the results of translocation (11,14), (8,14), (14,16), (14,20), 1q amplification, and deletion 17p. The patient was started on weekly bortezomib-lenalidomide-dexamethasone (VRd) and monthly zoledronic acid, and she is currently at the beginning of the treatment. The coexistence of MM and hairy cell leukemia has rarely been reported in the literature. MM cases with PC appearing like hair cells are very rare. [1,2]. The majority of these cases were presented as plasma cell leukemia (PCL), and it was interpreted that the presence of a chromosome 13 abnormality may be more common. No significant heavy-light chain association was observed [2]. Our case was not PCL, and we did not detect a chromosome 13 abnormality. In hematology practice, PC morphology should be carefully evaluated. The impact of the presence of a hairy cell-like appearance on patient prognosis can be determined with long-term follow-up.

References

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- [2]- Álvarez Flores MB, Jiménez Rolando M, Del Amo Del Arco N, Massó Asensio P, Guillén Santos R, Cava-Valenciano F. A rare finding of plasma cell leukaemia with hairy-cell morphology. *Pathology.* 2024 Apr;56(3):452-455. doi: 10.1016/j.pathol.2023.07.010.

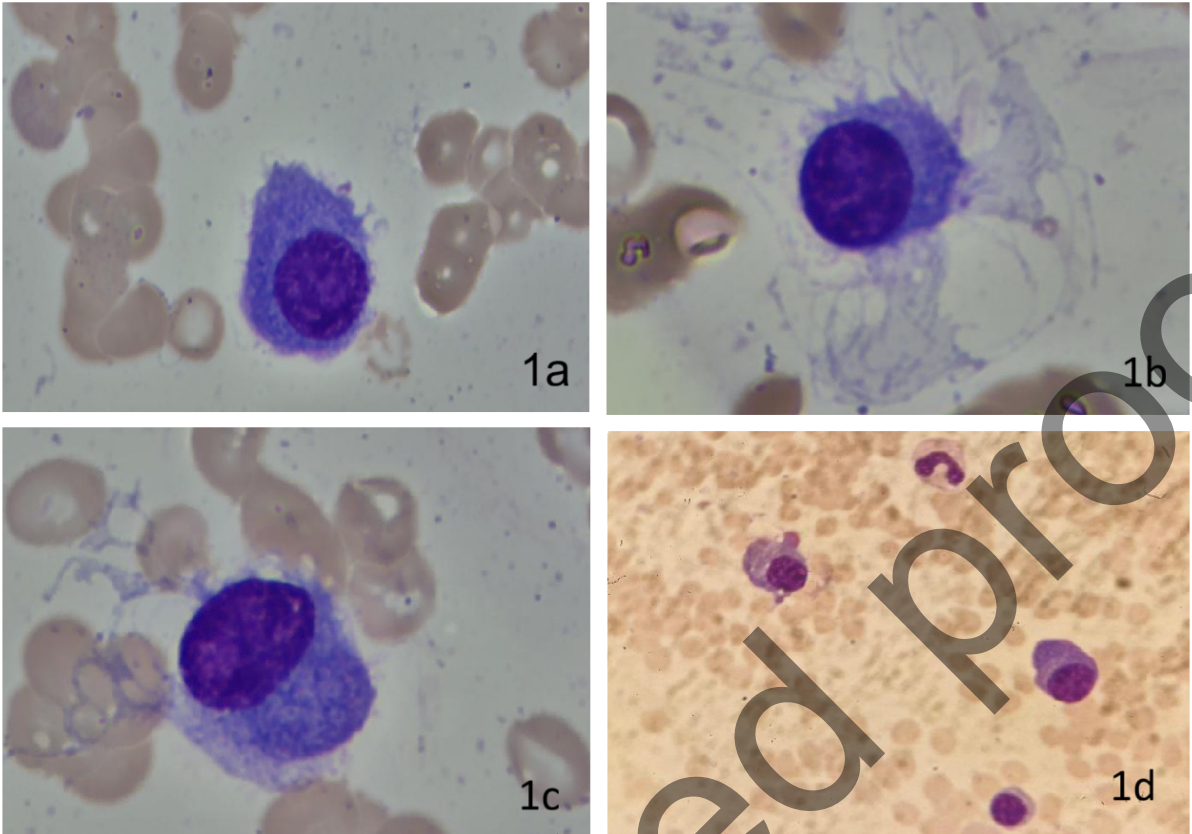


Figure 1a-b-c: Plasma cells with diffuse hairy cell-like cytoplasmic projections.

Figure 1d: A minority of plasma cells without projections

Figure 1a-1b-1c: Plasma cells with diffuse hairy cell-like cytoplasmic projections

Figure 1d: A minority of plasma cells without projections