Indolent Variant of Mantle Cell Lymphoma

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Background: A 56-year-old male presented with a history of 4 to 5 episodes of oral bleeding in 4 months. Bleeding was associated with gargling and brushing. For the last 2 weeks, the frequency and amount of bleeding had increased. One episode consisted of 4 to 8 ml blood. He had a history of weight loss by 4 kg in 4 months. He is hypertensive and on medicines for 12 years. On Examination, no organomegaly was seen. Hemogram shows, Hb 16 gm%, TLC 8500/cmm & platelet count 3 Lakh/cmm. Viral markers were negative. CT scan showed right tonsillar mass involving tongue, uvula, and Palate. Cervical lymph nodes were enlarged. PETCT supported CT findings along with mild prostatomegaly. Cyto- genetics showed 46 XY Karyotypes.

Materials and Method: Case study

Results: FISH study showed IGH/CCND1; t(11:14) in 90% of cells. Biopsy of the tonsillar mass showed abnormal lymphoid cells, which were CD20+, CD5+, Cyclin D 1+, CD 3 -, CD23 - CD10 -, BCL6 - & MUM 1-. MIB1 labeling index was >75%. Bone marrow Aspirate and biopsy showed no lymphoma infiltration. Based on Cyclin D+ and t(11,14), MCL was confirmed and the case was managed with Rituximab and Bendamustine regimen followed by Involved-field radiation therapy (IFRT). Prophylactic therapy with Acyclovir and cotrimoxazole was given. He is doing well and is on follow-up. Recent Flow Cytometry (Feb 2021) of peripheral blood didn’t show any clonal B-lymphoid cells. Hemogram and biochemistry reports are within the normal range. Even after approximately 4 years, the patient is asymptomatic and is doing well.

Conclusion: MCL is most common in adults, with a median age of 60 years with male predominance (M: F:2:1). The existing chemotherapeutic regimen isn’t considered very useful, but our case responded well yet despite having a high MIB1 labeling index was >75%. Our patient presented with an indolent case of Mantle cell lymphoma. With regard to diagnosis and therapeutic strategies, blastoid MCL remains a challenge. Most patients are not cured with current chemotherapy and have a median survival of 3–5 years High Ki-67 proliferation index is associated with adverse prognosis. Even with the low tumor burden combination chemotherapy with or without autologous stem cell consolidation, should be preferred but to be balanced against the expected therapy-associated toxicity. New strategies, including molecular approaches, immunological approaches, are being tested in clinical trials. Accurate and timely diagnosis is imperative because MCL has a rapid progression and early chemotherapeutic intervention results in improved survival.

Keywords: Mantle cell lymphoma, Non- Hodgkin lymphoma, Flow cytometry