

KMOP-Case 1 (2006/12)

Diagnosis

Congratulation, you are correct.

Amyloidosis, which can be systemic or localized, is an abnormal deposition of protein containing a fibrillary protein and a non-fibrillary glycoprotein (amyloid P component – AP). In our case, the patient had a systemic involvement of various organs, such as heart and eye. For oral involvement, tongue is the most frequent affected site, as in the present case, but other oral sites or salivary glands can also be affected. In our case, the affected site is the dorsal area and not the usual lateral tongue border manifesting a lobulated margin of macroglossia. It should also be noted that multiple myeloma (solitary plasmacytoma) can be associated with amyloid production. Therefore, the possibility of the underlying diseases should be identified when oral amyloidosis has been identified. Histologically, amyloid protein appears as weakly eosinophilic hyaline homogeneous material, as shown in Figs. 1A-F. In addition, it stains positively with Congo red (Fig. 1G), but it also shows an apple green birefringence under polarized light as well as positive fluorescence with thioflavine T and a fibrillary structure by electron microscopy.