Clinical importance of the presence of giant cells in temporal arteritis

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Abstract

Background: The clinical significance of giant cells seen on temporal artery biopsy in temporal arteritis is unknown.

Aim: To help define the prognostic value of the presence of giant cells in temporal arteritis.

Methods: The clinical course of all patients with biopsy proven temporal arteritis from 1994 to 2004 was reviewed. The 92 patients were divided into those with giant cells (GC) (n = 76) seen on biopsy and those with no giant cells (NGC) (n = 16). Clinical findings were compared between groups. An additional analysis combined results with a previous study at the same institution to compare occurrence of blindness.

Results: The GC group had a higher proportion of polymyalgia rheumatica (PMR) (36.8%) compared to the NGC group (12.5%) ($p = 0.059$). There was no significant difference in patient age, sex, sedimentation rate, or presenting symptoms. The length of time treated with corticosteroids and relapse rate was nearly identical for both groups. When combining data with the previous study, in the GC group 21/109 (19%) developed blindness, while only 2/34 (6%) became blind in the NGC group ($p = 0.11$).

Conclusion: The presence of giant cells is not a significant factor in determining treatment or clinical progression of temporal arteritis. However, results showed the GC group to have three times the occurrence of blindness and PMR compared to the NGC group. Although the differences were not significant, this analysis suggests an association with giant cells and more aggressive disease.