Three-dimensional conformal radiation therapy for refractory laryngeal granuloma

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ABSTRACT

Aims and background. The etiology of laryngeal granulomas is often multifactorial and the benefit of pharmacological therapy remains unclear. Anti-reflux treatment is only effective in granulomas definitely induced by gastroesophageal reflux. Steroid inhalation has shown favorable results but it is unclear whether it shortens the healing process. Surgical excision is associated with high recurrence rates. The aim of this study was to evaluate the role of 3-dimensional conformal radiation therapy (3DCRT) in the treatment of refractory laryngeal granuloma.

Methods and study design. The study was a retrospective review including all patients presenting to the Department of Radiation Oncology at Xijing Hospital from January 2004 to March 2007. We studied a total of 15 cases of refractory laryngeal granuloma that had recurred ≥ 2 times. Patients had previously been managed with voice rest, corticosteroids, antibiotics, antacids, surgery and botulinum toxin. All patients accepted surgical excision and immediate adjuvant 3DCRT at a total dose of 15 Gy over 5 days.

Results. All patients were successfully treated with surgery and 3DCRT. There has been no granuloma recurrence in 3 years of follow-up.

Conclusions. 3DCRT is a safe and effective therapy for refractory laryngeal granulomas, especially when other methods have failed.

> Key words: three-dimensional conformal radiation therapy, larynx, granuloma.

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