

## 2. Cancer

### Reference

Cho JH, Chung WK, Kang W, et al. Manual acupuncture improved quality of life in cancer patients with radiation-induced xerostomia. *Journal of Alternative and Complementary Medicine* 2008; 14(5): 523–6.

#### 1. Objectives

To investigate the effects of manual acupuncture on objective and subjective symptoms in cancer patients with radiation-induced xerostomia.

#### 2. Design

Randomized controlled trial (RCT).

#### 3. Setting

One Oriental hospital (Dunsan Oriental Hospital of Daejeon), Republic of Korea.

#### 4. Participants

Twelve (12) patients (male/female = 10/2; median age, 44 years; age range, 37–72) with head-neck cancer who received radiation therapy (minimum irradiation dose >38 Gy, >50% of the dose to the parotid gland).

#### 5. Intervention

Arm 1: (RA group): Treatment with acupuncture for 20 min at the Jiache (ST6, 頰車), Hegu (LI4, 合谷), Zusanli (ST36, 足三里), and Sanyinjiao (SP6, 三陰交) acupuncture points twice a week for 6 weeks (n=6).

Arm 2: (SA group): Treatment with acupuncture at sham points 2 cm from the real acupuncture points (n=6).

#### 6. Main outcome measures

Total salivary flow rate (stimulated, unstimulated), xerostomia questionnaire (XQ) score.

#### 7. Main results

- 1) Both the RA and SA groups showed an increase in unstimulated salivary flow rate. Especially in the RA group, salivary flow rate was markedly increased after 6 weeks of treatment compared with the pre-treatment rate (Wilcoxon rank-sum test,  $P<0.05$ ).
- 2) The RA group showed an increase in stimulated salivary flow rate, but there was no meaningful between-group difference in stimulated salivary flow rate.
- 3) The XQ score after 6 weeks was significantly increased in the RA group compared to the SA group (Wilcoxon rank-sum test,  $P<0.05$ ).

#### 8. Conclusions

Treatment (RA) significantly increases unstimulated salivary flow rate and improves the quality of life (QOL) of head-neck cancer patients with radiation-induced xerostomia.

#### 9. Safety assessment in the article

Not mentioned.

#### 10. Abstractor's comments

This article verified the effectiveness of traditional acupuncture for ameliorating symptoms of radiation-induced xerostomia in 12 patients with head-neck cancer. The treatment group (RA) received acupuncture for 20 min at the acupuncture points Jiache, Hegu, Zusanli, and Sanyinjiao twice a week for 6 weeks. The control group received acupuncture at sham points 2 cm from each acupuncture point. The stimulated and unstimulated total salivary flow rate and XQ score were compared between the two groups. RA resulted in better salivary flow rate and XQ score. However, the absence of a significant between-treatment difference suggests that sham acupuncture also had an effect. As the number of patients in the study was small, it is difficult to demonstrate a significant effect of acupuncture on xerostomia. Moreover, previous studies examining the effects of acupuncture on xerostomia showed different results. Therefore, large scale clinical trials comparing acupuncture with sham acupuncture should be performed to clarify their effects on xerostomia.

#### 11. Abstractor

Kim JS, 8 June 2010.