

June 07-08, 2018  
London, UKHasan Mujtaba et al., J Prev Infect Control 2018, Volume 4  
DOI: 10.21767/2471-9668-C1-002

## PREVALENCE OF HUMAN PAPILLOMAVIRUS IN THE TONSILS OF ADULTS AND CHILDREN FROM CHINA

**Hasan Mujtaba, Chen Xiaoli, Duan Yixin, Wang Ying and Wang Yili**

Xi'an Jiaotong University, China

**Introduction:** Among 200 different types of human papillomavirus (HPV) the mucocutaneous type are further subdivided into low risk types and high risk types. The recent reported increase in the HPV positive oropharyngeal squamous cell carcinoma (OPSCC) in the developed countries warrants the investigation of these HPV in the normal tonsils. The tropism of the HPV for the tonsillar reticular crypts has been reported due to incomplete basement membrane and the exposed basal epithelial cells of tonsils.

**Objective:** To detect and characterize the tonsillar tissue with HPV infection in children and adults from China.

**Methodology:** Formalin fixed paraffin embedded tonsillar tissue excised for non-malignant reasons such as tonsillitis and sleep apnea were evaluated. The successful DNA extraction from 367 positive cases confirmed by amplifying beta actin housekeeping gene, the screening for HPV by GP5+/GP6+ consensus primer was carried out. Genotyping was performed by type specific primers.

**Results:** A total of 9 (2.45%) cases were positive for HPV. Amongst them 6 (1.63%) were positive for high risk HPV while 3 cases were positive for low risk HPV. High risk HPV comprises of HPV 16 in 5 cases while 1 case was positive for HPV 58.

**Conclusion:** The major point of concern is oncogenic HPV detection in both children and adults in the benign tonsils. Sexual and non-sexual transmission of HPV has been reported.

The tonsillar tissue does not progress through the detectable premalignant lesion to the malignancy seen in the cervical cancers. Vaccines against the HPV in both male and female are probably the best way to contain this virus.

### Recent Publications

1. Fardeau S, Mullié C, Dassonville-Klimpt A, Audic N, Cubie H A (2013) Diseases associated with human papillomavirus infection. *Virology* 445(1–2):21–34.
2. Chaturvedi A K, Anderson W F, Lortet-Tieulent J, Curado M P, Ferlay J, Franceschi S, et al. (2013) Worldwide trends in incidence rates for oral cavity and oropharyngeal cancers. *Journal of Clinical Oncology* 31(36):4550–9.
3. Andersen A S, Koldjær Sølling A S, Ovesen T and Rusan M (2014) The interplay between HPV and host immunity in head and neck squamous cell carcinoma. *International Journal of Cancer* 134(12):2755–63.

### Biography

Hasan Mujtaba has completed his Bachelor's degree as a Dental Surgeon and later he completed his Master's degree in Oral pathology. Currently he is a Doctorate candidate at Institute of Cancer Research at Xi'an Jiaotong University, China.

drhasanmujtaba@ymail.com