

LETTER TO THE EDITOR

## No high-risk human papillomavirus infection in prostate cancer tissues

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### To the Editor,

Although human papillomavirus (HPV) has been associated with the development of specific cancers, its role as an aetiological agent of prostate cancer (PCa) is still the subject of debate. Therefore, we read with great interest the article by Dr Aghakhani and co-workers in which they reported the detection of high-risk (HR)-HPV DNA in 13 of 104 (12.5%) PCa and 8 of 104 (7.7%) benign prostatic hyperplasia (BPH) formalin-fixed paraffin-embedded tissue specimens [1].

Prior to this article, other investigators had reported higher rates of PCa in men with a history of exposure to HPV [2] and HPV associated with at least a subset of prostate carcinomas [3], while others had found no HPV DNA in PCa tissue [4], with most studies having limited power.

Recently we investigated the presence of 14 HR-HPV types in prostatic biopsy specimens from 61 Russian patients with PCa and 14 men with BPH (mean age 71.4 and 74.9 y, respectively) using an in-house PCR; only men with abnormal digital rectal examination (DRE) results and serum prostate specific antigen (PSA) levels above 4 ng/ml were included in the study. We found no association with PCa: no viral DNA was found in the BPH cases and HPV-16 and HPV-33 DNA were detected in only 3.3% and 1.6%, respectively, of PCa cases. To avoid sampling errors resulting in the taking of no malignant tissue by biopsy, we later sought to determine the

presence of 14 HR-HPV types using the validated GP5+/6+ assay [5], used worldwide. A total of 80 PCa tissue specimens obtained by taking the 4 histopathologically most suspect slides out of 20 archival paraffin tissues from Dutch men who had undergone a radical prostatectomy (mean age 61 y, preoperative PSA 13 ng/ml) were investigated (this was supported by a European Urological Scholarship Programme Clinical Fellowship 2007 to Dr Vitaly Smelov); all samples were negative.

Our recent data based on HR-HPV DNA detection indeed corroborate the conclusions of Aghakhani and colleagues that this transient most common sexually transmitted viral infection has no major role in the development of PCa [1]. However, men still represent an important source for the transmission of HPV: we need to focus on lowering HPV transmission between sexual partners and the role of male transmission of HPV in the development of other cancers [6].

**Declaration of interest:** The authors report no conflicts of interest. The authors alone are responsible for the content and writing of the paper.

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