

P320. The predictive value of the self-sampling of human papillomavirus DNA for the diagnosis of HSIL and cervical cancer in different social group

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Context. The main etiological factor of intraepithelial cancer and precancerous neoplastic cervical lesions is high-risk human papilloma virus (hrHPV). The detection of hrHPV is an effective screening tool for precancerous cervical lesions. Specificity and sensitivity of HSIL detection using patient-collected samples is comparable to that with samples collected by a doctor.

Objective was to make a comparative assessment of the predictive value the self-sampling of HPV DNA for the diagnosis of HSIL in different social group.

Methods. We used clinical methods, self-sampling device for HPV testing (Qvintip®) with instruction and physician-collected cervical specimens for HPV testing (Physician-HPV testing). The material was sent to the laboratory and then analyzed for the presence of high-risk HPV types by polymerase chain reaction amplification of HPV DNA.

Pathients. This is a cross-sectional study included 300 women. Group I consisted of 150 female prisoners aged from 25 to 65 years (average age was 37.8 ± 8.3). Group II consisted of 150 women from outpatient clinic at the same age.

Main Outcome Measures. HrHPV DNA was detected in 36.7% of study participants from group I and 26% women from group II ($p=0.046$). Monoinfection was detected in 36% of cases in group I and in 56% in group II ($p = 0.045$). The most frequently detected 16, 52, 39 and 33 genotypes. In group I more often detected genotypes: 16 - 45.3% ($? = 0.005$), 52 - 35.8% ($? = 0.025$) and 33 - 30.2% ($? = 0.007$).

Results. The results of this study was found that the agreement with a positive HPV test ($n = 153$) and in women with a negative HPV test ($n = 306$) established an almost ideal agreement ($k = 0.81$), and the consent rate was 92.2%. In group I, the percentage of disagreement was higher than in group II (97.3%, $k = 0.93$ and 87.3%, $k = 0.70$, respectively). Almost of all disagreements between the tests (82.6%) were recorded in the group of prisoners. The agreement between the tests is ideal and almost ideal in case of detection of all genotypes, except for HPV16 (the percentage of consent is 95.8, $k = 0.80$ is a significant agreement).

Conclusions. The social status of women effects on the effectiveness of the HPV self-sampling using. Self-collection of the sample is comparable with sample collection by a doctor and can be used as an alternative tool for hrHPV detection in women from outpatient clinic. In prisoners, the use of this method was less effective.