

HUMAN PAPILLOMA VIRUS (HPV) DETECTION AND GENOTYPING, QUALITATIVE

HUMAN PAPILLOMA VIRUS (HPV) DETECTION AND GENOTYPING, QUALITATIVE (Real Time PCR)	
Type of Specimen	
HPV DNA	Detected/Not detected
Genotype	

Interpretation

RESULT	REMARKS
Positive	Sample provided contains HPV DNA
Indeterminate	Presence of inhibitors in the sample
Negative	Sample provided does not contain HPV DNA or number of viral DNA copies are below the detection limit of the assay

Note:

1. High risk Human papilloma viruses detected are 16, 18, 31, 33, 35, 39, 45, 51, 52, 56, 58, 59 & 68. The low risk genotypes detected are 6 and 11.
2. All Indeterminate results should be retested.

Comments

Over 118, Papilloma viruses have been identified belonging to the family Papillomaviridae. HPV related cervical cancer constitutes about 12% of malignancies worldwide. Persistent infection with oncogenic types of HPV followed by HPV DNA integration into the cellular genome is a required precursor in the pathway leading to cervical neoplasia in females. HPV types have been categorized as High risk, Intermediate risk & Low risk. A large number of women, who are High risk HPV DNA positive, do not develop cervical cancer or precursor lesions like CIN-2 / 3. HPV infects epithelial tissues throughout the body including skin, larynx and anogenital tissues.

Sexually active males can also show HPV infections in oropharyngeal region and urine. Oropharyngeal squamous carcinoma (OSCC) has shown a gradual increase in male predominance due to increasing incidence of HPV infections.

Uses

Routine screening for HPV DNA in females reduces the incidence of cervical cancer and in males is linked to OSCC. High Risk genotypes 16 and 18 are linked to 70% of cervical cancers & OSCC. The low risk genotypes 6 and 11 are associated with genital warts.