



PREVENTION FOR CERVICAL CANCER

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WHY RAISE AWARENESS ABOUT CERVICAL CANCER

- First cancer with an Elimination strategy in world history
- WHO 2020 Global Strategy towards the Elimination of Cervical Cancer.
- **Set measurable targets by 2030 (90-70-90 strategy)**
 - a. 90% of girls should be fully vaccinated with HPV vaccine by 15 years of age
 - b. 70% of women should be screened using a high-performance test by age 35, and again by age 45
 - c. 90% of those identified with cervical disease should receive appropriate treatment
 - 1. 90% of women screening positive treated for pre-cancerous lesions
 - 2. 90% of invasive cancer cases managed.

NATURAL HISTORY OF HPV INFECTION

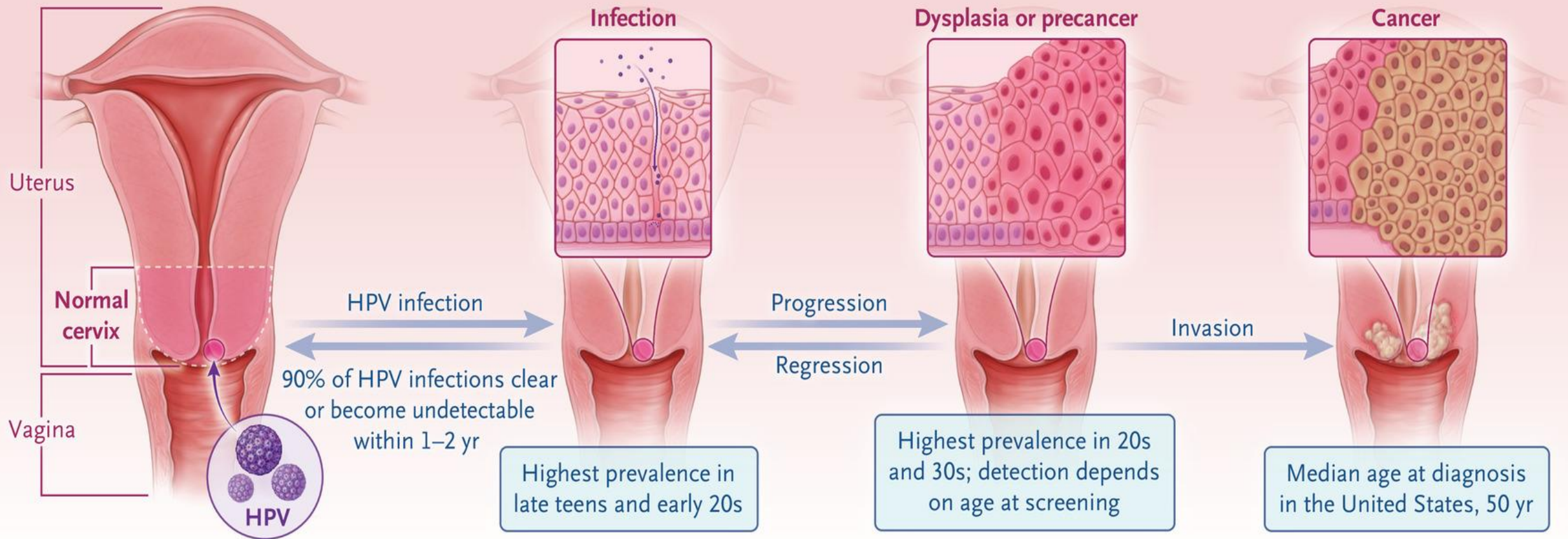



Table 1. Cancers Associated with and Attributed to Human Papillomavirus (HPV) Infection in the United States, 2015–2019.*

Cancer Site	No. of HPV-Associated Cancers	Percentage of Cancers Probably Caused by Any HPV Type	Estimated No. of Cancers Probably Caused by Any HPV Type†		
			Among Females	Among Males	Among Both Sexes
Cervix 	12,293	91	11,100	0	11,100
Vagina	879	75	700	0	700
Vulva	4,282	69	2,900	0	2,900
Penis	1,375	63	0	900	900
Anus‡	7,531	91	4,700	2,200	6,900
Oropharynx	20,839	70	2,300	12,500	14,800
Total	47,199	79	21,700	15,600	37,300

* Adapted from data provided by the Centers for Disease Control and Prevention (CDC) (<https://www.cdc.gov/cancer/hpv/statistics/cases.htm>). Data were compiled from population-based cancer registries that participate in the CDC National Program of Cancer Registries and in the Surveillance, Epidemiology, and End Results Program of the National Cancer Institute. The data met the criteria for high-quality data for all years in the 2015–2019 period, with coverage of 98% of the U.S. population.

† Estimates were based on studies that typed HPV. Most were high-risk HPV types that are known to cause cancer.⁷ Estimates were rounded to the nearest 100. Estimated counts may not sum to the expected total because of rounding.

‡ Anal cancer includes anal and rectal squamous-cell carcinoma.



PRIMARY PREVENTION

TARGET GIRLS AND WOMEN BEFORE ONSET OF SEXUAL ACTIVITY

WHO GUIDANCE ON HPV VACCINATION

- A one or two-dose schedule for girls aged 9-14 years
 - [Vaccine efficacy against persistent human papillomavirus.pdf](#)
 - Primary target for vaccination is girls (9-14 years) preferably prior to onset of sexual activity
 - Secondary targets such as boys and older females is recommended where feasible and affordable
- A one or two-dose schedule for girls and women aged 15-20 years
- Two doses with a 6-month interval for women older than 21 years

HPV VACCINATION

- Please vaccinate women upto the age of 26 years
 - [..\Downloads\vaccines-09-01413.pdf](#)
- Immunocompromised (HIV) individuals must receive 3 doses
 - [..\Downloads\Immunogenicity,safety,andefficacyoftheHPV vaccinesamongpeoplelivingwithHIV.pdf](#)

HPV VACCINATION

Key message

- One dose of the HPV vaccine is as good as two dose or three dose schedule

Policy implication

- Policy is to vaccinate each woman under the age of 26 years to catch up those who missed vaccination regardless of sexual history (at least target even those in universities and in postnatal clinics)
- No need to screen women <26 years for HPV prior to vaccination
- Women above 26 years may be vaccinated following proper discussion with the gynaecologist



SECONDARY PREVENTION

CERVICAL CANCER SCREENING

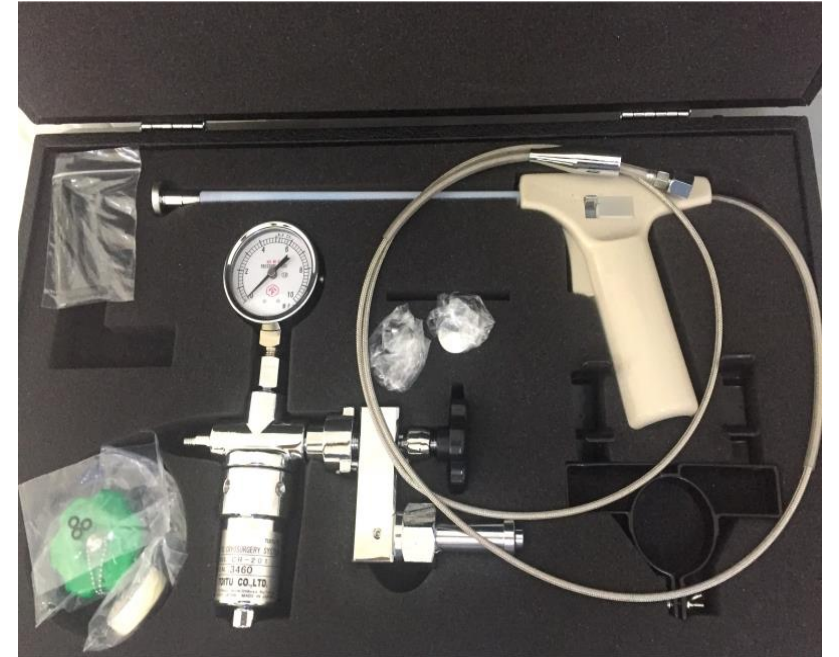
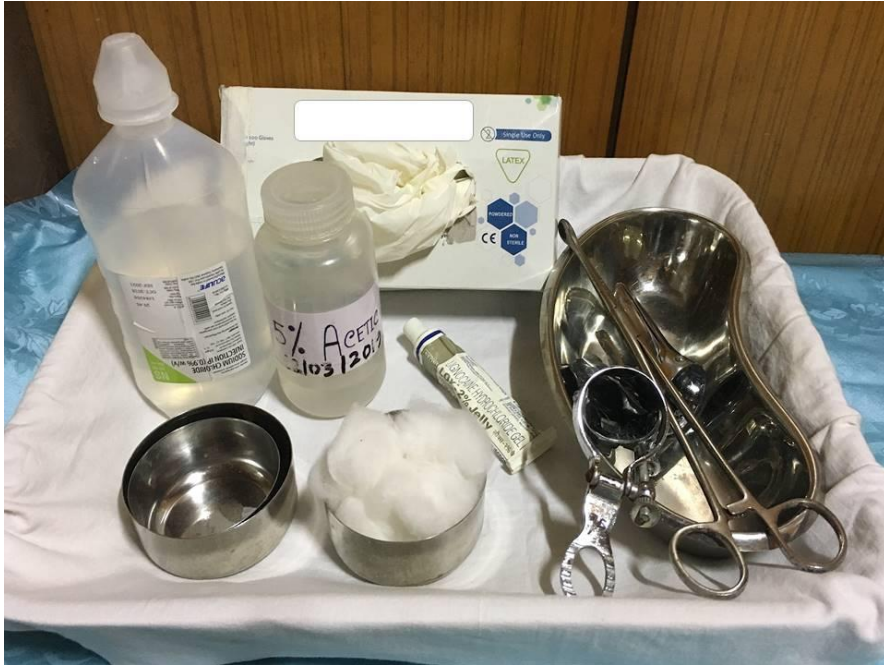
SCREENING MODALITIES/TESTS

1. Visual Inspection (Naked Eye/Cerviscopy/Gynoscopy)
2. Visual Inspection using Acetic Acid (VIA)
3. Cytology (Pap smear and Liquid Based Cytology)
4. HPV DNA test

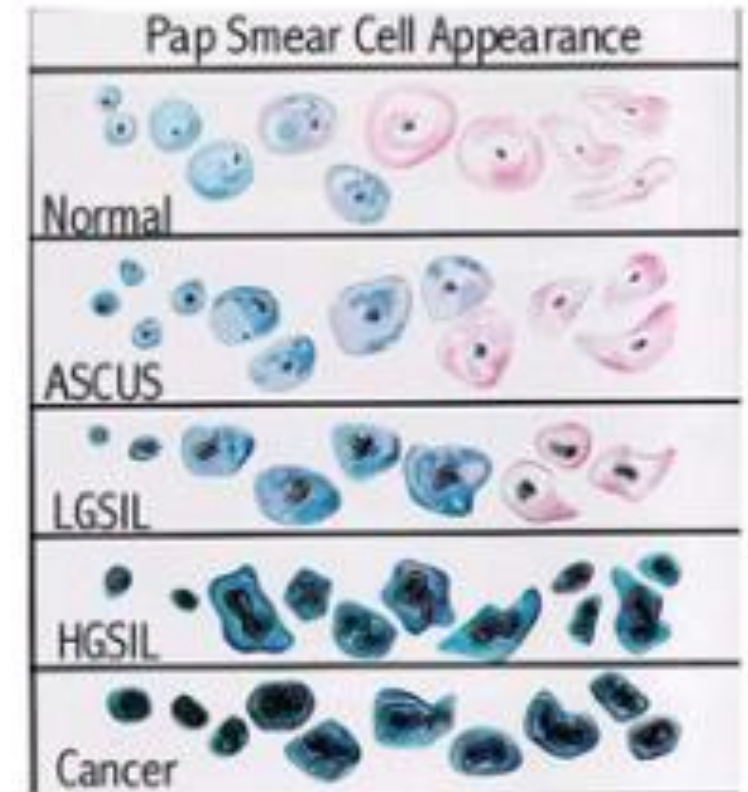
COMPARISON OF THE TESTS (GOLD STANDARD IS HISTOLOGY)

	Sensitivity	Specificity	Accuracy	PPV	NPV
VIA	88.8%	43.8%	63.4%	51.2%	83.3%
Pap smear	58.0%	85.2%	69.9%	83.3%	61.3%
HPV DNA	89.9%	89.9%			

VIA SET UP



PAP SMEAR TEST SET UP



HPV TEST KIT



SCREENING APPROACHES (WHO)

1. **Screen-and-Treat approach**", the decision to treat is based on a positive primary screening test only.
 2. **Screen, Triage and Treat approach**", the decision to treat is based on a positive primary screening test followed by a positive second test (a "triage" test), with or without histologically confirmed diagnosis.
- <..\Downloads\9789240030824-eng.pdf>

SCREEN AND TREAT APPROACH

Key message

- VIA is highly sensitive test, cheap and easy to perform so must be the test of choice to screen and treat in Uganda

Policy implication

- All women should at a minimum access the VIA test every three years
- Consider pregnant women less than 20 weeks in screening programs



THANK YOU