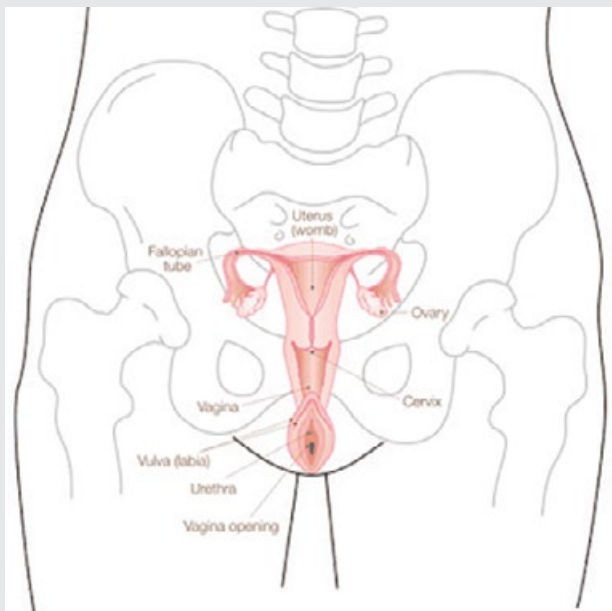


CERVICAL CANCER

WHAT IS CERVICAL CANCER?

CERVICAL CANCER IS CANCER OF THE CERVIX. THE CERVIX IS THE LOWER PART OF THE UTERUS, OR WOMB, AND IS SITUATED AT THE TOP OF THE VAGINA.

Cervical cancer develops when abnormal cells in the lining of the cervix begin to multiply out of control and form pre-cancerous lesions. If undetected, these lesions can develop into tumours and spread into the surrounding tissue.



WHAT CAUSES CERVICAL CANCER AND ABNORMAL CERVICAL CELLS?

Cervical cancer is caused by infection with certain types of a common virus, called human papillomavirus, or HPV.

While other factors such as the oral contraceptive pill, smoking, a woman's immune system and the presence of other infections also seem to play a part, a woman has to have been infected with certain high-risk HPV types before cervical cancer can develop. High risk types 16 and 18 are responsible for ~70% of all cervical cancers.

Abnormal cervical cells are also caused by HPV infection, and these may be detected when a woman has a routine Pap Smear.

DOES EVERYONE WITH HPV GET CERVICAL CANCER?

Fortunately, no. For the majority of people who have HPV, the body's defences are enough to clear the virus. Up to 90% of infections are cleared within 36 months.

However, for some people who don't clear certain low-risk types of the virus, benign (abnormal but non-cancerous) changes in the cervix can develop.

And for women who don't clear certain high-risk types of the virus, abnormal changes can occur in the cells lining the cervix that can lead to pre-cancers and even develop into cervical cancer later in life. Most often, the development of pre-cancer to cervical cancer can take a number of years, although in rare cases it can happen more quickly. That's why early detection is so important.

Talk to your healthcare professional about regular Pap Smears, which help detect suspicious cell changes in the cervix.

HOW WILL I KNOW IF I HAVE HPV?

Because HPV infection does not usually show any signs or symptoms, you probably won't know you have it. Most women are diagnosed with HPV as a result of abnormal Pap Smear. A Pap Smear is part of a gynaecological examination that aims to detect abnormal cells in the lining of the cervix before they have the chance to become cervical cancer. In fact, invasive cervical cancer is one of the most preventable cancers. Although distressing, pre-cancers detected during a Pap Smear can be treated. That's why it's important to follow your healthcare professional's recommendation about regular Pap Smears.



HPV EXPLAINED

Human papillomavirus, or HPV, is a common virus that affects both females and males. There are more than 100 types of the virus. In fact, certain types of HPV cause common warts on the hands and feet. Most types of HPV are harmless, do not cause any symptoms, and go away on their own.

About 40 types of HPV are known as genital HPV as they affect the genital area. More than 50% of people (males and females) will be infected with at least one type of genital HPV at some time.

Genital HPV types may be high-risk types (such as HPV Types 16 and 18) that can cause cervical pre-cancer and cancer, or low-risk types (such

as HPV Types 6 and 11) that can cause genital warts and usually benign (abnormal but non-cancerous) changes in the cervix. Both the high-risk and low-risk types of HPV can cause abnormal Pap Smears.

Anyone who has any kind of sexual activity involving genital contact could get genital HPV. That means it's possible to get the virus without having

intercourse. And, because many people who have HPV may not show any signs or symptoms, they can transmit the virus without even knowing it.

A person can be infected with more than one type of HPV.

HPV is highly contagious. It is estimated that many people get their first type of HPV infection within their first few years of becoming sexually active.

Genital HPV infection is not something to feel embarrassed or ashamed about. It is very common and most often goes away without any ill effects.

It could almost be considered a normal part of being a healthy sexually active woman.

Cervical cancer is cancer of the cervix. The cervix is the lower part of the uterus, or womb, and is situated at the top of the vagina. Cervical cancer develops when abnormal cells in the lining of the cervix begin to multiply out of control and form pre-cancerous lesions. If undetected, these lesions can develop into tumours and spread into the surrounding tissue.

WHAT ARE ABNORMAL CERVICAL CELLS?

These are cells from the lining of the cervix that look abnormal when a scientist examines a Pap Smear (also called Pap test) under a microscope. While most Pap Smears contain only normal cells, some Pap Smears show mild cell changes, others show more significant changes.

EACH YEAR IN AUSTRALIA
APPROXIMATELY 14,000
WOMEN ARE DIAGNOSED
WITH HIGH GRADE CERVICAL
ABNORMALITIES REQUIRING
SURGICAL TREATMENT. IN
ADDITION, APPROXIMATELY
14,000 WOMEN ARE DIAGNOSED
WITH LOW GRADE CERVICAL
ABNORMALITIES REQUIRING
FURTHER INVESTIGATION AND/
OR SCREENING.

HPV is a common virus that can cause cervical cancer, abnormal cervical cells and other consequences. Learn more about these conditions in the other sections of this site, and talk to your healthcare professional for more information.

HOW COMMON IS CERVICAL CANCER?

Each year in Australia approximately 700 new cases of cervical cancer are diagnosed and over 200 women die from this disease. Globally, cervical cancer is the second most common women's cancer, which is why many countries, including Australia have implemented regular cervical screening (ie Pap Smears) programs to detect cervical abnormalities.

The incidence of invasive cervical cancer has fallen dramatically in the last decade, due to the formation of the National Cervical Screening Program, which takes the form of 2-yearly Pap Smears for women.

Reference: Australian Institute of Health and Welfare. Cervical Screening in Australia 2006-2007. April 2009 AIHW cat no CAN 43



HOW IS CERVICAL CANCER DETECTED?

Cervical cancer can be detected in two ways. A woman may present to her health professional with symptoms due to the cancer, or the cancer may be detected in its early stages with a Pap Smear, before the woman has any symptoms.

If a woman's Pap Smear shows cancerous cells, she will then be immediately seen by a specialist doctor, usually a Gynaecologist, to confirm the diagnosis and plan appropriate treatment.

WHAT IS A PAP SMEAR?

THE PAP SMEAR OR PAP TEST IS A TEST THAT CAN DETECT ABNORMAL CELLS IN THE CERVIX THAT MAY LEAD TO CERVICAL CANCER. WHEN DETECTED EARLY, CHANGES TO THE CERVIX ARE EASY TO TREAT. THAT IS WHY HAVING A PAP SMEAR EVERY TWO YEARS IS SO IMPORTANT.

A Pap Smear requires the use of a vaginal speculum but it only takes a minute or two. It is performed by a doctor or nurse, who will take a sample of cervical cells by touching the cervix with a small brush and spatula. The cells are then smeared onto a glass slide and the slide is sent to a pathology laboratory to be examined under a microscope.

A Pap Smear only tests for abnormal cells of the cervix. It does not screen for ovarian cancer or any other gynaecological cancers.

OTHER CONSEQUENCES OF HPV INFECTION

A proportion of vaginal and vulvar cancers have also been linked to infection with high risk HPV types. Over 90% of genital warts cases are due to infection with low risk HPV types 6 and 11.

ABOUT VAGINAL AND VULVAR CANCERS?

Although relatively rare, in 2005, there were 340 cases of vulval and vaginal cancer in Australian women.

Infection with certain types of high risk HPV is a risk factor for vaginal and vulval cancers and other risk factors include cigarette smoking, immunodeficiency syndromes and a previous history of cervical cancer.

WHAT ARE GENITAL WARTS?

Genital warts are benign, flesh-coloured growths that are most often caused by certain low-risk types of human papillomavirus (HPV). Genital warts most often appear on the external genitals or near the anus of females and males. Less commonly, genital warts can also appear inside the vagina and on the cervix. Genital warts may cause symptoms such as burning, itching, and pain. The types of HPV that cause genital warts (usually types 6 and 11) are different from the high-risk types that can cause cervical cancer.

HOW COMMON ARE GENITAL WARTS?

Genital warts are quite common. Probably more than 1% of the sexually active population has them at any one time. After sexual contact with an infected person, genital warts may appear within weeks, months, or not at all.

HOW ARE GENITAL WARTS DIAGNOSED?

A healthcare professional can usually recognise genital warts just by seeing them. Because a person can be infected with more than one type of HPV, a healthcare professional may also examine women with genital warts for abnormal cervical cells caused by high or low-risk types of HPV.

HOW ARE GENITAL WARTS TREATED?

Genital warts can disappear on their own without treatment. However, there is no way to tell if they will grow larger or disappear. Depending on the size and location of the genital warts, there are several treatment options. A healthcare professional may choose to apply a special cream or solution to the warts. Some genital warts can be removed by either freezing, burning, or using laser treatment. However, no matter the treatment, there's a chance that genital warts will reappear after treatment, since the types of HPV that cause them may still be present.



PROTECTING YOURSELF

WHAT CAN I DO TO HELP PROTECT MYSELF FROM CERVICAL CANCER?

Because HPV is so easily passed on, it is quite difficult to prevent yourself from being infected with this common virus. More than 50% of males and females will be infected with at least one type of HPV at some time in their life. But remember that most people clear HPV infection from their body without any symptoms or health problems.

If used correctly, condoms can help reduce the risk of genital HPV. However condoms don't provide 100% protection against HPV as it is transmitted through genital skin contact not just sexual intercourse.

VACCINATION

IT IS NOW POSSIBLE TO BE VACCINATED AGAINST CERVICAL CANCER. CURRENTLY AVAILABLE VACCINES PROTECT AGAINST HPV TYPES THAT ACCOUNT FOR UP TO 80% OF CERVICAL CANCER CASES AND THE MAJORITY OF PRE-CANCEROUS CERVICAL ABNORMALITIES.

The Australian government is currently funding the cervical cancer vaccine for eligible girls and women. Females aged 12 to 18 years, who have not completed their course at school and 18 to 26 year old women, still have a chance to receive the free vaccine, provided you have your first dose before 30th June and complete all 3 doses by 31st December 2009.

For women aged 27 to 45 years the cervical cancer vaccine is not Government funded but is available as a private script. Speak to your GP to see if vaccination is suitable for you.

Vaccination does not protect against all HPV types that could cause cervical cancer therefore it is important vaccinated women continue with regular Pap Smears.

Together, vaccination and regular Pap Smears offer an ideal prevention strategy against both cervical cancer and pre-

cancerous cervical abnormalities. Speak to your doctor for further information or to receive your vaccine.

HAVE REGULAR PAP SMEARS

Your risk of developing cervical cancer can be reduced by having regular Pap Smears which are an early detection screening program. Always make sure you receive the result of your Pap Smear from your healthcare professional.

Pap Smears are usually performed every 2 years, unless your GP or nurse has asked you to have them more frequently. Regular Pap Smears are a very good way of picking up abnormal cells before they progress into cervical cancer. If you are or have ever been sexually active (with either male or female partners) you should be having 2-yearly Pap Smears, starting when you are 18 to 20 years, and continuing through until age 70.





TREATMENT

HOW ARE ABNORMAL CERVICAL CELLS AND PRE-CANCERS TREATED?

Abnormal cervical cells can be divided into low-grade and high-grade abnormalities. Low-grade changes are almost always benign or non-cancerous. Many women can have a low-grade lesion which will clear without causing any lasting effects.

According to current Australian guidelines, if a woman's Pap Smear shows low-grade changes, her healthcare professional may advise a repeat Pap Smear sooner than 2 years (usually after 6 or 12 months). Sometimes colposcopy (an examination of the cervix with a special microscope) may also be offered, either straight away or after the repeat Pap Smear, if it shows that the low grade changes are still present.

While most high-grade changes will eventually go away, occasionally highgrade changes will progress to cervical cancer if left untreated. This usually takes a number of years, although in rare cases it can happen sooner.

If a woman's Pap Smear shows high-grade, pre-cancerous changes she will be referred for a colposcopy. In many cases, during the colposcopy a small piece of tissue (a biopsy) will be taken from the cervix.

If the biopsy confirms the woman has a high-grade cervical lesion (referred to as CIN 2 or 3), she will most likely be offered surgery to remove the affected part of the cervix. This can be done using a variety of ways including amongst other techniques, surgical excision and laser removal. This usually requires a day stay in hospital.

HOW IS CERVICAL CANCER TREATED?

If, after colposcopy and biopsy, a woman is found to have cancer of the cervix, rather than a pre-cancer, she will usually be referred to a specialised cancer gynaecologist for further assessment and management. The cancer may be staged according to the level of invasiveness.

Usually, treatment for cervical cancer involves surgery to remove the cancer (including local excision, hysterectomy) and/or radiotherapy with or without additional chemotherapy depending on the size or stage of the tumour. If detected early, cervical cancer can be treated, but as with any medical condition prevention or early detection is always best if it is available.

STATISTICS

- Cervical cancer is the fourth most common cancer in women, and the seventh overall, with an estimated 528,000 new cases in 2012.
- A large majority (around 85%) of the global burden occurs in the less developed regions, where it accounts for almost 12% of all female cancers.
- High-risk regions, with estimated ASRs over 30 per 100,000, include Eastern Africa (42.7), Melanesia (33.3), Southern (31.5) and Middle (30.6) Africa.
- Rates are lowest in Australia/New Zealand (5.5) and Western Asia (4.4). Cervical cancer remains the most common cancer in women in Eastern and Middle Africa.
- There were an estimated 266,000 deaths from cervical cancer worldwide in 2012, accounting for 7.5% of all female cancer deaths. Almost nine out of ten (87%) cervical cancer deaths occur in the less developed regions.
- Mortality varies 18-fold between the different regions of the world, with rates ranging from less than 2 per 100,000 in Western Asia, Western Europe and Australia/New Zealand to more than 20 per 100,000 in Melanesia (20.6), Middle (22.2) and Eastern (27.6) Africa.

Reference :
<http://globocan.iarc.fr/old/FactSheets/cancers/cervix-new.asp>

TALK TO YOUR
HEALTHCARE
PROFESSIONAL
FOR MORE
INFORMATION.