



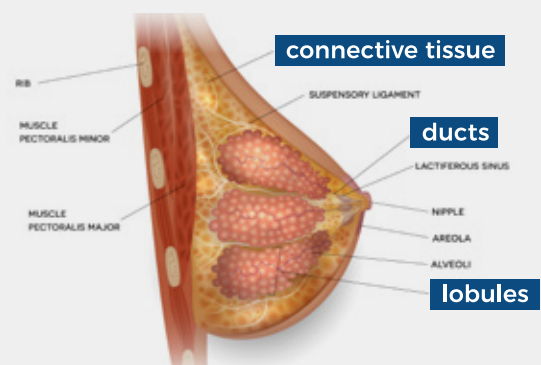
BREAST CANCER:

WHAT IT IS & WHAT PUTS YOU AT RISK

After skin cancer, breast cancer is the second most common cancer among women. Cancer is a disease which causes cells in the body, in this case the breast, to grow out of control. These cells can spread, or **metastasize**, to other parts of the body. According to research conducted by the National Cancer Registry in 2019, approximately **1 in 27** South African women will develop breast cancer in their lifetimes. Approximately 19.4 million women aged 15 years and older live at risk of being diagnosed with breast cancer. In 2013, deaths from breast cancer accounted for just under 1 in 100 of all deaths in South Africa.

Breast cancer can begin in different parts of the breast. A breast is made up of three main parts: lobules, ducts and connective tissue. Most breast cancers begin in the ducts or lobules. Like other cancers, breast cancer can spread outside the breast through blood and lymph vessels.

The Breast



The **lobules** are the glands that produce milk

The **ducts** are tubes that carry milk to the nipple

The **connective tissue** (which consists of fibrous and fatty tissue) surrounds and holds everything together



What are the different types of breast cancer?

The language used by oncologists (doctors who specialise in treating cancer) can seem complicated, but it's based on some very simple principles. The site of the cancer in the breast, and whether or not it is invasive (whether the cancer has spread to other parts of the breast or not), are the main factors that doctors consider when classifying a possible case of breast cancer.

COMMON TYPES OF BREAST CANCER:

DUCTAL CARCINOMA IN SITU (DCIS)

Also known as intraductal carcinoma, this is a **non- or pre-invasive** breast cancer of the breast duct. It is a benign or premalignant tumour.

INVASIVE BREAST CANCERS (ILC OR IDC)



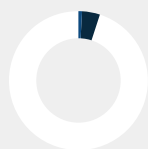
70-80%: Invasive ductal carcinomas and invasive lobular carcinomas

Cancers of the ducts and lobes that have spread to other parts of the breast.



15%: Triple-negative breast cancer

An aggressive invasive breast cancer caused by a deficiency of the protein HER2 and a lack of progesterone and oestrogen receptors in the breast cells.



1-5%: Inflammatory breast cancer

Another aggressive type of invasive breast cancer which occurs when cancer cells block lymph vessels in the skin, causing the breast to look red or "inflamed". It is rarest of the 'common' cancers.



LESS COMMON TYPES OF BREAST CANCER



1-3%: Paget disease of the breast

Starts in the breast ducts and spreads to the skin of the nipple and then to the areola (the dark circle around the nipple).



Less than 1%: Angiosarcoma

Sarcomas of the breast are rare, making up less than 1% of all breast cancers. Angiosarcomas start in the lining of the blood and lymph vessels. They can spread to the breast tissue or skin, and may be caused by having undergone radiation therapy in the same area.



Less than 1%: Phyllodes tumour

Very rare and generally benign, these tumours develop in the connective tissue of the breast.



What causes breast cancer?

All breast cancers start in the same way: cells in a part of the breast reproduce themselves too fast. These cells divide faster than your healthy cells and form a lump. These bad cells may spread through your breast to your **lymph nodes** or to other parts of your body.

Most commonly, breast cancer begins in the cells in the breast ducts responsible for producing milk. This is called an **invasive ductal carcinoma**. Breast cancer may also begin in the lobules, **known as an invasive lobular carcinoma**, or in other cells or tissue within the breast. These two types account for the majority of breast cancer cases.

Research into the **causes of breast cancer**, the genetic, as well as hormonal, lifestyle and environmental factors connected to the disease, says that these all influence the likelihood of getting breast cancer, but they are not 100% sure of how and why this happens. People who have no risk factors may still develop cancer, yet other people with multiple risk factors can live long, cancer-free lives.



Your **genes** (the 'blueprint' for your cells). People with a family history of breast cancer are 5-10% more likely to develop breast cancer in their lifetimes than people who have no history of breast cancer in their families.



Scientists have identified some of the genes responsible for causing breast cancer and can test to see if you have them. If you have a family history of breast cancer, consider asking your doctor for a blood test to see if you have the BRCA genes.



Your **age**. Science shows that people are more likely to get cancer as they get older.



Exposure to **radiation**. Women who have been treated with radiation for their chest when they were children are more at risk of developing breast cancer.



Your **weight**. Obese women are more likely to develop breast cancer.



If you started your **period early**. Women who begin menstruating before the age of 13 are more at risk of developing breast cancer.



If you **don't have children**. Women who never have children, and women who have their first pregnancy after the age of 30, are more likely to develop breast cancer.



If you are **post-menopausal**, and especially if you are undergoing hormone treatment for the symptoms of menopause, your likelihood of developing breast cancer is slightly higher than average.



If you **drink alcohol** on a regular basis, you are slightly more at risk of developing breast cancer.



The best cure is prevention! Women who have regular mammograms are more likely to catch breast cancer at the pre-invasive stage, so make sure you get tested regularly to minimise your risk of serious disease.