

This resource has been developed as part of the Implementing Pathways for Cancer Early Diagnosis (I-PACED) project supported by the Victorian Government. It aims to increase GP awareness about critical primary care points as outlined in the breast cancer Optimal Care Pathway – a nationally endorsed resource. This resource refers to women throughout, however where appropriate, the recommendations are intended to apply to all patients.

Summary statistics

- In Victoria 2019, there were 4,617 cases of breast cancer in women (and 41 in men)
- The five-year survival for people with breast cancer is 91%.

Prevention

An individual's personal breast cancer risk should be estimated in order to optimise and tailor prevention advice. There are risk prediction tools available for women to undertake, however, some of the risk tools such as iPrevent require extensive family history information that women may need assistance to complete:

- iPrevent www.iprevent.net.au
- IBIS tool <https://ibis.ikonopedia.com>
- CanRisk Web Tool www.canrisk.org

For all people, consider:

- Physical exercise - 150-300 minutes of moderate-intensity exercise per week
- Maintain a healthy weight
- Avoid or limit HRT use
- Avoid or limit alcohol intake.

For women with a breast cancer risk >1.5 times that of the age-matched population, consider risk-reducing medication (tamoxifen, raloxifene or an aromatase inhibitor).

For women with a breast cancer risk >3 times that of the age matched population, risk-reducing bilateral mastectomy may be considered.

Family history and genetic factors¹

Referral to a familial cancer clinic should be considered if the high risk is due to FHx factors as genetic testing may lower the risk estimate.

Consider referring:

- Untested adult blood relatives of a person with a known pathogenic variant (mutation) in a breast and/or ovarian cancer predisposition gene
- People with two 1st or 2nd degree relatives diagnosed with breast or ovarian cancer, plus one or more of the following on the same side of the family:
 - ▶ Additional relative(s) with breast or ovarian cancer
 - ▶ Breast cancer diagnosed <50 years
 - ▶ More than one primary breast cancer in the same woman
 - ▶ Breast and ovarian cancer in the same woman
 - ▶ Jewish ancestry
 - ▶ Breast cancer in a male
 - ▶ Pancreatic cancer
 - ▶ High grade (\geq Gleason 7) prostate cancer.

Risk factors

- Being female
- Age
- Previous breast cancer (invasive or DCIS)
- Previous LCIS or atypical hyperplasia
- Reproductive factors – HRT use, nulliparity, late age at 1st birth, early menarche, late menopause, never having breastfed
- Alcohol consumption
- Post-menopausal weight gain
- Inadequate physical activity.

For more information, visit Cancer Australia's www.breastcancerriskfactors.gov.au

Reference: 1. eviQ. Referral guidelines for breast cancer risk assessment and consideration of genetic testing. Cancer Institute NSW. 2019.

Screening recommendations

- Mammographic screening is available to asymptomatic women from the age of 40 through the BreastScreen Australia Program
- Asymptomatic women aged 50-74 years at average risk should consider undergoing a two-yearly screening mammogram
- In this age-group, **over-diagnosis needs to be considered**, and women invited to screening must be informed of the potential disadvantages as well as the benefits of mammographic screening. Refer to **Figure 2** (right).

Signs and symptoms

Figure 1 Risk assessment tool for significance of specific symptoms by age group:

- New lump or lumpiness, especially involving only one breast
- Change in the size or shape of a breast
- Change to a nipple, such as crusting, ulceration, redness or inversion
- Nipple discharge that occurs without squeezing
- Change in the skin of a breast such as redness, thickness or dimpling
- Axillary mass(es)
- An unusual breast pain that does not go away (breast pain alone, especially in women under 60 is a weak predictor of breast cancer).

Figure 1: **Risk assessment tool**²

Age, years	Risk as single symptom				Breast lump/pain
	Breast pain	Nipple discharge	Nipple retraction	Breast lump	
40-49	0.17	1.2	n/a	4.8	4.9
50-59	0.80	2.1	2.6	8.5	5.7
60-69	1.2	2.3	3.4	25	6.5
≥70	2.8	23	12	48	>5.0

Probability of cancer

<1%
 1-2%
 2-5%
 >5%

n/a Insufficient data around PPV in this age group

Figure 1. shows the probability of breast cancer for individual symptoms and the combination of lump and pain for women aged ≥40 years.

Figure 2: **Mammogram screening in asymptomatic women at average risk of breast cancer**^{3,4,5}

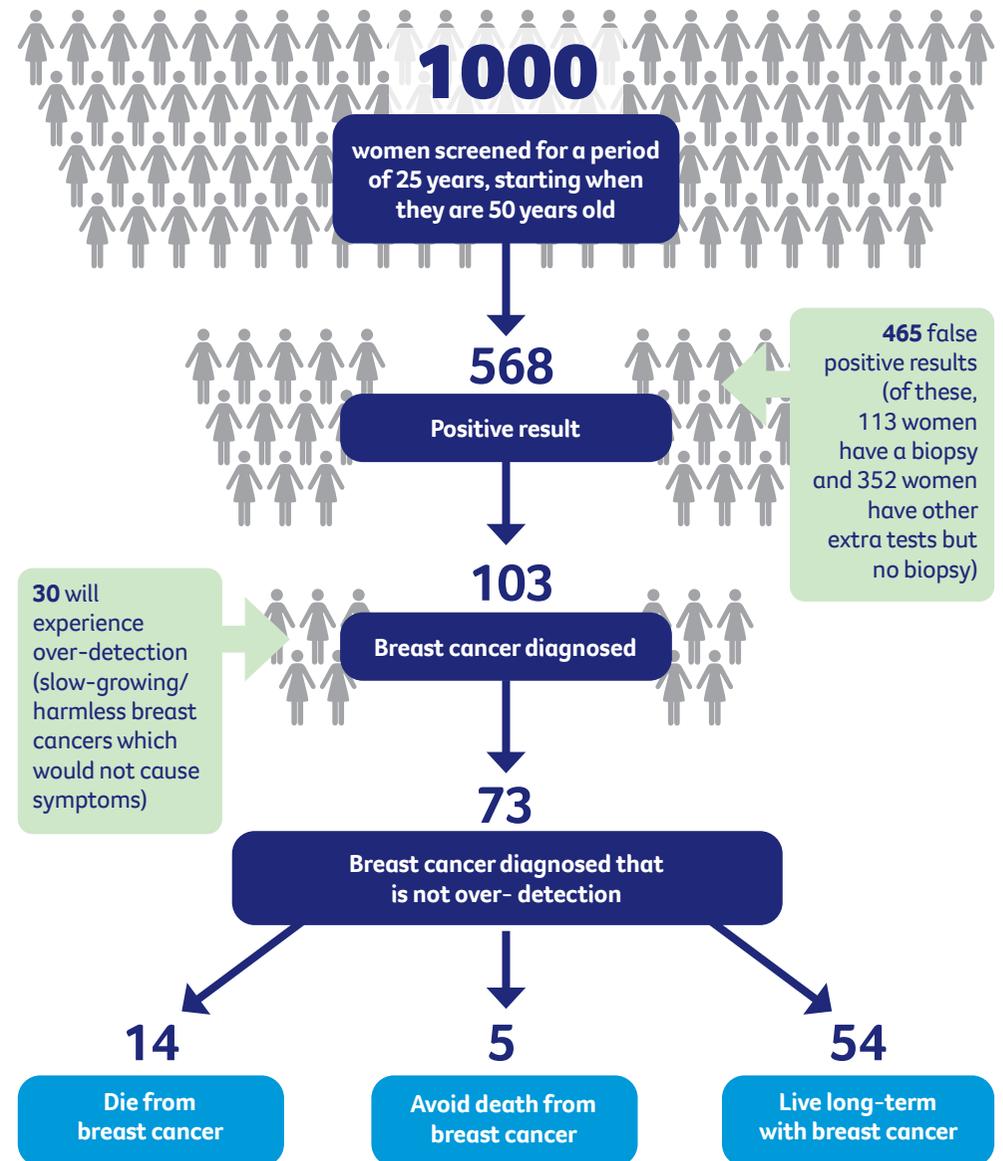




Figure 3: Investigation of a new breast symptom

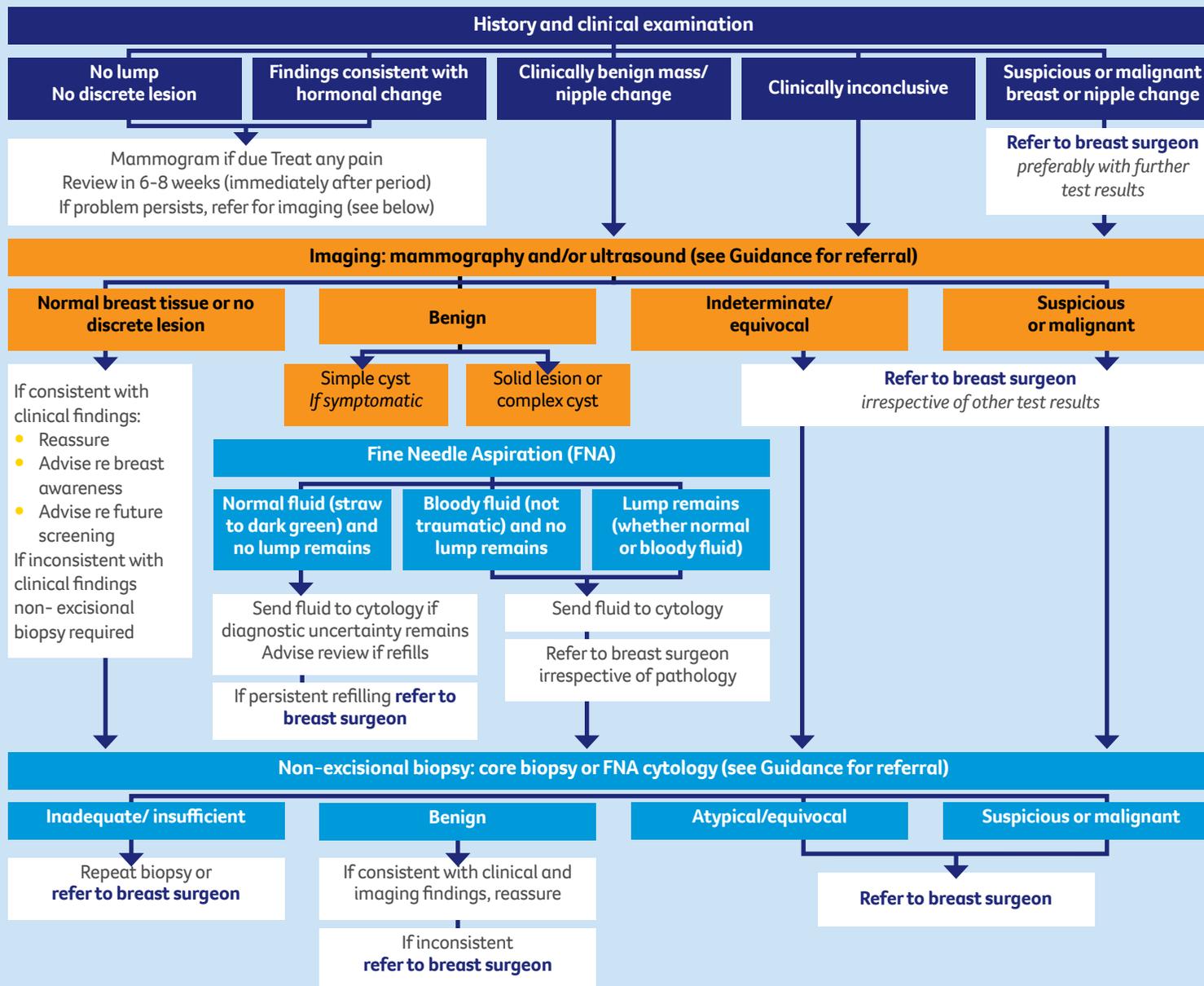


Figure 3 describes the investigations that should be completed within two weeks and include a triple test of three diagnostic components#:

1. Medical history and clinical breast examination
 2. Imaging – mammography and/or ultrasound
 3. Non-excisional biopsy: preferably core biopsy
- The triple test is more accurate at detecting breast cancer than any of the individual components alone.
 - When performed appropriately the triple test will detect over 99.6% of breast cancers.
 - A triple test negative on all components provides good evidence that cancer is unlikely (less than 1%).

References

2. Walker S, Hyde C, Hamilton W. Risk of breast cancer in symptomatic women in primary care: a case-control study using electronic records. Br J Gen Pract 2014; DOI: <https://doi.org/10.3399/bjgp14X682873>
3. Hersch J, et al. Use of a decision aid including information on overdetection to support informed choice about breast cancer screening: a randomised controlled trial. Lancet 2015; 385: 1642.
4. Barratt A, et al. Model of outcomes of screening mammography: information to support informed choices. British Medical Journal 2005; 330: 936.
5. Independent UK Panel on Breast Cancer Screening. The benefits and harms of breast

#This information is reproduced from *The investigation of a new breast symptom: a guide for general practitioners* with permission from Cancer Australia. <https://canceraustralia.gov.au/publications-and-resources/cancer-australia-publications/investigation-new-breast-symptom-guide-general-practitioners>



Diagnostic imaging⁶

Mammography should be performed in all age groups if the clinical or ultrasound findings are suspicious or malignant.

Under age 35

- Ultrasound is recommended as the first imaging modality.
- Mammography should be used in addition to ultrasound if:
 - ▶ the clinical findings are suspicious or malignant or
 - ▶ the ultrasound findings are indeterminate, suspicious or malignant or
 - ▶ the ultrasound findings are not consistent with clinical findings.

35 years and over

- Mammography and ultrasound should both be performed.

In pregnancy or lactation

- Ultrasound is the most useful modality.
- Mammography should be used if the clinical or ultrasound findings are indeterminate, suspicious or malignant or there is inconsistency between test results.

Imaging of the axilla

- If mammography or ultrasound findings are suspicious or malignant the ipsilateral axilla should also be imaged with ultrasound.

Reference: 6. Cancer Australia. The investigation of a new breast symptom: a guide for General Practitioners. 2017.

Referral pathway

- Prior to referral, discuss the cost implications to enable patients to make an informed decision regarding their choice of specialist and health service, including out of pocket costs: for example, radiological tests and specialist appointments.
- GPs should refer all women with a suspicious lesion to a breast assessment clinic to be seen within two weeks.
- A positive result of any component of the triple test warrants specialist surgical assessment referral. Ideally the patient should see the patient with proven or suspected cancer within 2 weeks of diagnosis. .
- Referral information should include all clinical information, medical and psychosocial background and all images and diagnostic reports (old and new).

To gain access to your local HealthPathways visit

<https://vtphna.org.au/care-pathways-and-referral/> or equivalent care pathways site.

Patient resource checklist

- ✓ Factsheets and resources at www.livelifighter.com.au
 - ✓ For additional practical and emotional support, encourage patients to call **Cancer Council 13 11 20** to speak with an experienced oncology nurse or visit www.cancervic.org.au for more information about breast cancer
- For translator assistance call TIS on 13 14 50**
- ✓ Download the Guide to best cancer care – breast cancer at www.cancercareguides.org.au
 - ✓ **Breast Cancer Network Australia** – for free information packs, support and resources, visit www.bcna.org.au or freecall **1800 500 258**

The Optimal Care Pathways were developed through consultation with a wide range of expert multidisciplinary teams, peak health organisations, consumers and carers. They are nationally endorsed by the National Cancer Expert Reference Group, Cancer Australia and Cancer Council Australia.

For more information on the Optimal Care Pathways please refer to www.cancervic.org.au/for-health-professionals/optimal-care-pathways

