BreastScreen WA 1999-2000

Statistical Summary

Department of Health
Government of Western Australia

BreastScreen WA
Department of Health

BreastScreen AUSTRALIA
A joint Commonwealth/State and Territory Program

The sixth BreastScreen WA Annual Statistical Report presents summary outcomes of screens from 1st July 1999 to 30th June 2000. This brochure is an extract of the Report, including the key results and performance against selected National Accreditation Requirements (1994). The full Report is available on request.

Breastscreen WA

The screening program BreastScreen WA aims to reduce mortality and morbidity attributable to breast cancer by providing mammography screening for a symptomatic women and follow-up assessment to the point of diagnosis for any suspicious lesions identified at screening. Although women aged over 40 years are eligible for screening, the program actively recruits woman aged 50 to 69 years, as it is this age group that has been shown to obtain the most benefit from mammography screening programs.

I would like to thank all of the staff of BreastScreen WA, working at the State Coordination Unit, the screening units and the assessment services, for their high standard of work and outstanding level of commitment to the program and the women of Western Australia.

Breast cancer continues to be the most common cancer and the most frequent cause of cancer death in Australian women. Early detection is essential for the reduction of mortality and morbidity associated with breast cancer.

In 1999-2000 BreastScreen WA consolidated the structure of the service. Following the restructure of 1997 and 1998 and the public tender process for screening services, the contract to provide screening services was granted to BreastScreen WA as it is currently structured.

This report reflects the first year of the Breast Assessment WA service, provided as one service at two sites, Royal Perth Hospital and Sir Charles Gairdner Hospital.

Prior to the establishment of the Breast Assessment Service in 1998, 57% of women with screen-detected abnormalities were assessed outside of the program. In 1999/2000 this fell to 10% of women with screen-detected abnormalities. Fewer assessments outside of the program has lead to an increase in the pre-operative diagnosis of breast cancer, and a reduction in open diagnostic biopsies and early recall rates.

Despite the difficulties of recruiting and retaining experienced staff, BreastScreen WA increased the number of women screened to 63,661 screens in 1999/2000.

Ongoing challenges that face BreastScreen WA include securing sufficient staffing and other resources that will allow the service to increase its participation rate in the target age group of 50-69 years. Encouraging Indigenous women to participate is a particular challenge facing the service. In 2001, BreastScreen WA employed an Indigenous Promotions Officer who has developed, in consultation with Indigenous consumers, breast cancer screening promotional material for Indigenous women. She has also developed a range of breast cancer screening promotional resources for Indigenous health workers and introduced an Indigenous Women's Reference Group to assist BreastScreen WA with developing culturally appropriate resources and policies.

Rapid population growth in the South Outer Metropolitan and South West areas of the state requires BreastScreen WA to increase screening capacity in the region as a priority.

I would like to acknowledge the commitment, dedication and high technical and professional standards of staff working for BreastScreen WA in all components of the service.

Dr Elizabeth Wylie
Medical Director
10th April 2003

Key Results for 1999/2000

ATTENDANCE

- BreastScreen WA performed 10,725 (17%) first and 52,936 (83%) subsequent screens, totalling 63,661 screens, between July 1999 and June 2000. The 50-69 year target age group made up 75% of all screens.
- Seventy one percent of the women aged 50-69 years who had a screen between July 1997 and June 1998, returned for a rescreen within the following 27 months.
- The 24-month participation rate to June 2000 for the target age group was 52%. The program screened 2,300 more women in this age group than in the 24 months to June 1999, compared with an increased population of 6000 in that age group.

DEMOGRAPHY

- Metropolitan residents made up 72% of all women, and 73% of women in the target age group, screened in 1999/2000.
- One percent of the women screened (769) were of Aboriginal or Torres Strait Islander background and 11% (7,135) were of culturally and linguistically diverse background, speaking a language other than English at home.
- The 24-month participation rate for target age women in the metropolitan area was 50%. The metropolitan participation rate for women of culturally and linguistically diverse backgrounds in the same age group was 54% while for metropolitan Indigenous women it was 17%.

RECALL TO ASSESSMENT

- The overall recall rate was 6% of all screens, or 11% for first and 5% for subsequent screens.
- For women aged 50-69 years, 95% of the screens resulted in a normal outcome while 5% were referred on for assessment procedures such as diagnostic further views, ultrasound, fine needle aspiration or core biopsy.

ASSESSMENT PROCEDURES

- On average, each woman recalled for assessment underwent 2.4 assessment procedures. Seventy six percent required only further mammographic views, clinical examination and/or ultrasound to confirm an outcome indicating no significant abnormality.
- Recommendations for diagnostic open biopsy were made for 3% of all assessments, or 0.2% of screens.
- Of those women attending for assessment, 90% had a benign outcome and 10% had a malignancy detected.
- Eighty nine percent of all cancers were diagnosed preoperatively by either fine needle aspiration (61%) or by core biopsy (29%). Diagnosis by core biopsy histology has increased by 10%, compared with 1998/1999.
- Ten percent of all cancers were diagnosed by diagnostic open biopsy, a decrease of 14% since 1998/1999.

CANCER DETECTION RATE

- A total of 356 breast cancers were screen-detected (0.6% of screens). Of these, 22% were *in situ* cancers and 78% were invasive, with 36% of the invasive cancers being less than or equal to 10mm or 67% being less than or equal to 15mm in diameter. Two non-breast cancers were detected and two cancers were detected at early review and are thus classified as interval cancers. The overall breast cancer detection rate was 56 per 10,000 women screened.
- Interval cancer rates for screens in 1998 were 4.1 and 8.8 per 10,000 for first and subsequent screens, respectively, for the 12 months following a normal mammogram.
- Women with larger cancers had more node metastases. Cancers less than 15mm had 19% of excised nodes positive, while 39% of those with cancers greater than 15mm were node positive. The greatest proportion of lower grade cancers were of smaller size.

TREATMENT

- Breast conservation surgery was used to remove 70% of malignancies detected. One third of all women with breast cancer chose to have a mastectomy, more frequently chosen by those living in country areas and those with ductal *in situ* cancers.

Summary of Outcomes of Breast Cancer Screening in 1999/2000

The table below summarises the outcomes of screening and assessment for women who attended for a screen from July 1999 to June 2000. It displays the information in two streams according to screening round - first screens or all subsequent screens.

FIRST SCREENS	SUBSEQUENT SCREENS
ATTENDANCE	
Screening Mammograms **10,725** (17%)	Screening Mammograms **52,936** (83%)
SCREENING OUTCOMES	
Recalled for assessment: **1,212** (11%)	Recalled for assessment: **2,524** (5%)
Routine rescreen: **9,513** (89%)	Routine rescreen: **50,412** (95%)
ASSESSMENT OUTCOMES	
Recommendation after assessment: Diagnostic open biopsy 36; Definitive cancer treatment 60; Early review 43; Other 5; Total: **144** (12%)	Recommendation after assessment: Diagnostic open biopsy 85; Definitive cancer treatment 256; Early review 66; Other 4; Total: **411** (16%)
No malignant lesion: **1,059** (88%)	No malignant lesion: **2,112** (84%)
CANCER DETECTION	
Breast cancers detected: Invasive <=15mm 33; 16-25mm 13; 26-50mm 5; >50mm 2; unknown 0; Sub-total: 53 (49 per 10,000 screens); DCIS 15 (14 per 10,000 screens); Total: **68** (63 per 10,000 screens)	Breast cancers detected: Invasive <=15mm 150; 16-25mm 55; 26-50mm 15; >50mm 2; unknown 0; Sub-total: 222 (42 per 10,000 screens); DCIS 64 (12 per 10,000 screens); Total: **286** (54 per 10,000 screens)
No malignant lesion[1]: **76** (90%)	No malignant lesion[1]: **125** (81%)
CANCER TREATMENT	
Mastectomy **23** (34%); Breast conserving surgery **44** (65%); No surgery **1** (1%)	Mastectomy **81** (28%); Breast conserving surgery **204** (71%); No surgery **3** (1%)
INTERVAL CANCERS	
0-12 mths 4.1 per 10,000 screens; 13-24 mths 7.0 per 10,000 screens	0-12 mths 8.8 per 10,000 screens; 13-24 mths 10.6 per 10,000 screens

[1] *Benign outcome after diagnostic open biopsy, early review or other*

Minimum performance standards

Minimum standards and requirements are in place for accredited services operating within BreastScreen Australia. The table below summarises the performance of BreastScreen WA against selected National Accreditation Requirements (1994) using the information presented in this Report.[2] Since 2001 new and additional minimum standards have been developed for the national program.

Standard	Performance Objective	Minimum Standard	BreastScreen WA Performance
1.2	To maximise the number of women screened who are aged 50-69 with the aim of screening 70% of this group.	Participation by 60% of the target group after five years in the program.	Participation to June 2000 was 52%.
1.3	To maximise participation by Aboriginal and Torres Strait Islander women and women from non-English speaking backgrounds.	In urban areas, participation by Aboriginal and Torres Strait Islander women and women from non-English speaking backgrounds will be at least 50% of the rate for the general population.	Participation to June 2000 was 33% and 104%, respectively, of the rate for the general urban population.
1.5	To maximise client acceptance of the Service as evidenced by high participation rates among those invited for routine rescreening.	>= 75% of women aged 50-69 years screened will be rescreened within the recommended interval.	71% of women aged 50-69 screened in 1997/1998 returned for a rescreen within 27 months.
2.9	To minimise the number of women recalled for mammographic assessment.	Assessment recalls < 10% of women screened at prevalent round and <5% at incident round.	11% of first screens and 5% of subsequent screens were recalled for assessment.
2.18	To minimise the proportion of women referred for open biopsy.	Referrals for open biopsy will be <2% of all women screened.	0.2% of women screened were referred for open diagnostic biopsy.
2.23	To maximise the number of cancers detected.	At least 50 cancers per 10,000 women screened will be detected in prevalent rounds, and at least 20 per 10,000 women screened in incident rounds.	63 cancers per 10,000 first screens and 54 cancers per 10,000 subsequent screens.
2.24	To maximise the number of minimal invasive cancers detected.	At least 8 per 10,000 women screened will be found to have invasive cancers <=10mm diameter on pathology.	16 invasive breast cancers less than 10mm were detected per 10,000 screens.
2.25	To detect a representative proportion of ductal carcinoma in situ (DCIS) at the prevalent screening round.	10-20% of cancers detected will be DCIS.	22% of all cancers detected were DCIS.
2.26	To minimise the number of interval cancers.	No more than 6 per 10,000 women screened will develop breast cancer (including DCIS, but excluding LCIS[3]) in the 12 months following screening. screens.	In the period 0 - 12 months following a screen, the interval cancer rate was 4.1 per 10,000 first screens and 8.8 per 10,000 subsequent

[2] Although the National Accreditation Requirements refer to screens as 'prevalent' and 'incident', data throughout this Report uses the terminology 'first' and 'subsequent' instead.

[3] LCIS refers to Lobular Carcinoma in situ

BreastScreen WA
9th Floor Eastpoint Plaza
233 Adelaide Terrace
PERTH WA 6000
Telephone: (08) 9237 6900
Fax: (08) 9237 6999
Web-site: www.breastscreen.health.wa.gov.au