has been produced. This study compares the survival of screen detected cancers with symptomatic cancers treated in a single centre.

Methods: 219 women aged 50–64 were diagnosed with breast cancer from the prevalent round of the NHBSP in Oxfordshire between Sept. 1990–Aug. 1993. 279 control patients aged 50–64 were diagnosed with invasive breast cancer in the symptomatic breast clinic between Jan. 1987–Aug. 1993. All data were collected prospectively onto a computerised database.

Results: 5 yr overall survival (OS) in patients with screen detected cancer was significantly better than the control (89.6% v. 74.3%; p = 0.0049 logrank; 59.6% reduction in mortality). In patients with screen detected invasive cancer, this difference was still present (88.5% v 74.3%; p = 0.0048 logrank; 55.3% reduction in mortality). After correction for 1 year lead time bias, these differences were still significant. After 2 years correction, there was a trend to improved survival with screening, which was not statistically significant. OS in interval cancers & non-attenders did not differ from the control group (p = 0.79 & p = 0.27 logrank respectively).

Conclusions: These data refute some of the concerns about the NHBSP & confirm that mammographic screening programmes can lead to the significant improvements in survival as suggested by previous randomised & population based studies.

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Results of mammographic screening 1994–1997

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Purpose: Mammographic screening has a determinative importance because reduces mortality-rate for breast cancer in women between 50 and 69 years. Authors report their results about a biennial (94–97) mammographic screening programme.

Methods: Women who accepted have been subjected to mammographic examination with axial and oblique projection. Diagnostic assessment has been performed with ultrasonography a/o eco-guidance FNAB. Results are compared with standards provided by the National Breast Screening Programme in the United Kingdom (UK) and also by Italian Group for Mammographic Screening (GISMa).

Results: 13768 women were invited form 1/11/94 to 31/12/97. 9073 have been tested. Attendance rate was 65.8%. Recall rate to diagnostic assessment was 5.8%. According to results of diagnostic assessment 61 surgical biopsies were performed. 56 carcinomas were detected in 56 women. Cancer detection rate was 0.61%. Detected cancer were non palpable in 60% of cases. Pathologic staging was pT1a in 1 case, pT1b in 8, pT1c in 19, pT2 in 13, pT3 in 1. 16 of 43 cancers involved axillary nodes. 13 of remaining cases were operated in other hospitals and we have no information about results of histologic examination.

Conclusion: Results are acceptable or excellent in comparison with UK and GISMa standards. So that authors suggest an extension of the screening programme to a wider geographic area.

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The experience of breast cancer screening

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Special interview of 1500 breast cancer (BC) patients show that 81% of them first notice BC symptoms themselves, 10.5% of all cases were revealed by check up nurses, 5.5%-by physician, 3%-by mammography. A prospective sudy has been conducted in Moscow to study the implementation posibilities and efficiency of two BC screening methods: breast self-examination (BSE), yearly clinical breast examination (CBE). Three cohorts two screening and one control, with about 3000 women ages 40–69 in each were formed. The follow up and control the adherence rate showed that regular BSE performed in the corresponding cohort only 31% of women, 24%-performed it unregular and 45%-not at all. 67% of women from other cohort invited for CBE have visited the corresponding screening unit. The analysis of reasons which keep women from screening examinations showed that most of them have not enough knowledge and beliefs concerning BC screening.

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Mass-screening for breast cancer in Japan

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In Kochi Prefecture in Japan, where the population of women over 30 is 292,000, we have carried out mass-screening for breast cancer since 1975. We examined women over 30 annually by physical examination, inspection and palpation. At that time we recommended them to perform self-examination every month.

Results: We examined 686,509 women since 1975. 19,602 women were introduced to the hospitals for further examination, and 475 breast cancers were detected. Detection rate gradually decreased from 0.1% to 0.07%, and repeaters increased to 90.2%. It was 0.12% in women who were examined first time, and 0.06% in the others. That did not changed from the beginning. But the rate of early stage breast cancer, 2 cm or less, increased up to 68% in 1996 compared with 40% at the beginning. Also during this period the corrected death rate has been under 8 per 100,000 in Kochi Prefecture, whereas it gradually increased to 12.4 in Japan in 1997. Standard mortality ratio (SMR) declined from 95 to around 80 (the average in Japan is 100). By survey, 69.2% of examiners who have experienced mass-screening performed self-examination.

Conclusion: Mass-screening by physical examination, promoting self-examination, contributed to increase the rate of early stage breast cancer and depress the death rate and SMR.

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Results of screening in a positive family history clinic

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Purpose: It has been estimated that 1 in 200 women will develop breast cancer as a result of genetic predisposition, many of whom will have a positive family history. The aim of this study was to evaluate the utility of a family history clinic in the first year.

Methods: Clinics were held twice a month and guidelines for referral were established. Referral patterns with respect to age and family history were noted. Numbers of referrals to a clinical geneticist and the increased use of mammography were recorded.

Results: A total of 126 new patients were referred in the first year, of whom 89/126 (71%) had a significant family history and 95/126 (75%) were under the age of 50 years. One patient (0.8%) with asymptomatic breast cancer was diagnosed on mammography. It was estimated that the clinic would generate a demand for 783 screening mammograms over the first five years. Eighteen patients (14%) were referred to the clinical geneticist, all of whom were under 40 years of age.

Conclusions: Referral to the clinics was appropriate in most cases and high risk cases were referred for genetic counselling. The family history clinic detected breast cancer in 0.8% of the study population compared to 0.7% in the National Breast Screening Programme and is a worthwhile addition to the breast service.

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Can the mortality of breast cancer be reduced?

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Introduction: The mortality of breast cancer remains relatively unchanged by the therapeutic advances of the past twenty years. The aim of this study was to investigate the mortality curves of breast cancer and compare these with colorectal cancer.

Methods: All cases of breast cancer from 1980–96 were identified and the pathological stage derived. Cause of death was determined from the Registrar General. The yearly proportional mortality (YPMR) due to breast cancer was determined by tumour size and nodal status. From an existing database of long-term follow-up of colorectal cancer with accurate stage, similar survival curves were drawn.

Results: The YPMR remained almost constant over a ten year period of follow up for tumours that were node negative, or less than 30 mm. This reflects a constant mortality rate which does not decrease with time. For larger tumours and node positive tumours there was a rise in the YPMR for