



**INFORMATION LEAFLET FOR
GENERAL PRACTITIONERS**

**HORMONE REPLACEMENT THERAPY AND
BREAST CANCER**

HORMONE REPLACEMENT THERAPY AND BREAST CANCER

Many women suffering with severe menopausal symptoms have undoubtedly been helped by taking HRT. Menopausal symptoms vary from person to person and are temporary. Menopausal symptoms can be relieved by a variety of ways and HRT is one of them. HRT also prevents osteoporosis and heart diseases.

However research has shown HRT as one of the risk factors in causing breast cancer. HRT increases the risk of recurrence of breast cancer. Use of HRT makes interpretation of mammograms difficult. Studies have shown that cancers due to HRT are of lower biological aggressiveness and have a better prognosis (Holli, Isola and Cuzick 1998). The cancers are low grade, but found at later stage on mammographic screening (Esteve et al. 2002).

GP practice - Issues

- Does use of HRT increase the risk of breast cancer?
- Can HRT be given to women with a family history of breast cancer?
- What is the absolute risk of breast cancer in women on HRT?
- Can HRT increase the risk of benign breast diseases?
- Can HRT be prescribed to women with breast cancer who have severe menopausal symptoms?
- Can tibolone (livial) be used to treat menopausal symptoms in breast cancer patients?
- What is the relative risk of breast cancer for different types of HRT?

Does use of HRT increase the risk of breast cancer?

Yes, use of HRT increases the risk of breast cancer. Pooled original data from 51 studies shows that an increase in the risk of breast cancer is related to the duration of use of HRT. Risk is greatest with combined HRT. The risk disappears within about 5 years of stopping HRT. Oestrogen only HRT led to no increased risk in breast cancer. The effect on mortality cannot yet be assessed. Those who use it for a short period around the menopause are hardly affected.

Can HRT be given to women with a family history of breast cancer?

The relative risks for those whose mothers or sisters have had breast cancer do not differ from those with no family history. However women with family history of breast cancer should be informed of the increased risk due to

taking HRT. Symptom severity and other individual circumstances should be taken into account before giving HRT. Use of HRT should be restricted to shortest duration and as low a dose as possible. Oestrogen only HRT should be prescribed where possible.

In women who have an elevated risk of breast cancer, short term use of HRT is unlikely to have a harmful effect.

What is the absolute risk of breast cancer in women on HRT?

Absolute risk of breast cancer in women on HRT

Time on HRT	Breast cancers over the 20 years from age 50 to 70	Extra Breast cancers in HRT users
Never	45 per 1000	-

5 years use	47 per 1000	2 per 1000
10 years use	51 per 1000	6 per 1000
15 years use	57 per 1000	12 per 1000

Can HRT increase the risk of benign breast diseases?

HRT are indicated in the development of both benign and malignant breast disease. Twenty five benign cases are seen for every cancer and they effect up to 50% of the female population. Benign breast conditions due to HRT do not increase the risk of cancer.

Can HRT be prescribed to women with breast cancer who have severe menopausal symptoms?

In breast cancer patients, after treatment for breast cancer the menopausal

symptoms experienced are more severe than in healthy post menopausal women. The incidence of symptoms is similar with both Tamoxifen and Aromatase inhibitors. Symptoms have a negative impact on quality of life. Therefore, there is interest in HRT because there is no alternative remedy. It is thought that even short-term use of HRT may pose a risk for women with a history of breast cancer. The evidence is not clear but early results from a Swedish trial in 2004 suggest that HRT increases the risk of recurrent breast cancer. Women with menopausal symptoms should discuss options very carefully with their specialist. Clonidines, Gabapentin are ineffective. Vitamin E, Evening Primrose Oil and ginkgo biloba have no trials to support their efficacy. Black cohosh may have some benefit but Phytoestrogens may counter the effects of Tamoxifen. Complementary and

alternative treatments such as acupuncture, aromatherapy, massage, homeopathy and relaxation have no trials to back their efficacy. After invasive breast cancer HRT may be safe in ER negative and ER positive disease if using Tamoxifen.

Can tibolone (livial) be used to treat menopausal symptoms in breast cancer patients?

Tibolone is a synthetic steroid and the risks of breast cancer as shown by Million women study is between those for oestrogen only and combined HRT and not proven to be safe in breast cancer.

What is the relative risk of breast cancer for different types of HRT?

Type of HRT	Relative risk
Oestrogen only HRT	1.30

Oestrogen-Progestogen HRT	2.00
Tibolone	1.45

Relative risk of breast cancer in women on HRT

Excess Breast Cancers age 50-65

Normal risk 32 per 1000

Risk with Oestrogen only HRT

For 5 years **1.5** cancers per 1000 women

For 10 years **5** cancers per 1000 women

Risk with Oestrogen-Progestogen HRT

For 5 years HRT **6** cancers per 1000 women

For 10 years HRT **19** cancers per 1000 women

References

<http://www.millionwomenstudy.org/>

Reeves G, Beral V, Green J, Gathani T, Bull D, for the Million Women Study Collaborators. **Hormonal therapy for menopause and breast-cancer risk by histological type: a cohort study and**

meta-analysis. *Lancet Oncology*

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Collaborative Group on Hormonal
Factors in Breast Cancer: **Breast cancer
and hormone replacement therapy:
collaborative reanalysis of data from
51 epidemiological studies of 52 705
women with breast cancer and 108
411 women without breast cancer.**

Lancet 1997, **350**:1047-1059.