
Appendix 1

Questions and answers on the use of hormone replacement therapy (HRT) by women who have had breast cancer

A guide for women and their physicians

What is hormone replacement therapy?

Hormone replacement therapy (HRT) refers to treatment with pills or skin patches that contain the hormone estrogen or the hormones estrogen and progesterone combined. Hormones are chemicals that affect the activity of certain cells or organs. For example, both estrogen and progesterone play an important role in a woman's life, regulating menstrual periods and affecting the growth of breast tissue. These hormones are produced in the ovaries, but they can also be made in a laboratory or obtained from plants and animals.

Why is HRT prescribed?

As women leave their child-bearing years behind, they begin to produce less estrogen and progesterone. Lack of estrogen can lead to unpleasant menopausal symptoms such as hot flashes and vaginal dryness. A lack of estrogen can also contribute to osteoporosis (the loss of bone tissue). HRT is often prescribed to relieve menopausal symptoms and reduce the risk of osteoporosis. HRT may also be prescribed when a woman experiences premature menopause, whether naturally or as the result of medical treatment.

I have been treated for breast cancer in the past. I am now having hot flashes and other menopausal symptoms. Should I take HRT?

Probably not. At present, too few studies of HRT use by women with breast cancer have been completed. In addition, the study results available do not indicate whether HRT is safe for women who have had breast cancer.

Why is HRT considered unsafe for women who have had breast cancer?

Researchers know that estrogen plays a role in the development of breast cancer. Studies using animals have shown that estrogen affects breast cancer growth. Other kinds of studies have shown that women exposed to more estrogen throughout life — for example, women who begin their periods at an early age or enter menopause at a late age — are at increased risk of breast cancer. Studies have also shown that women who have never had breast cancer increase their risk of the disease if they take HRT for an extended period. The risk of breast cancer increases for each year of use. A woman who has had breast cancer is at risk of having the cancer return or of developing another cancer in the opposite breast. This knowledge, combined with research findings about estrogen, has led to a concern that HRT could trigger the recurrence of breast cancer in a woman who has already had the disease.

Are there alternatives to HRT?

Yes. Several alternative treatments have been studied and found to relieve menopausal symptoms:

- *Hot flashes:* Venlafaxine, a relatively new antidepressant medication marketed as Effexor.
- *Vaginal dryness:* K Y lubricating jelly and Replens, a vaginal moisturizer.
- *Sexual and urinary problems:* Estradiol vaginal rings such as Estring, which provide controlled local delivery of very low doses of estrogen. (Creams are not recommended because the estrogen in them passes into the blood, and this can lead to high concentrations of estrogen in the body.)

Other alternative treatments have been found to improve bone mass and reduce the risk of osteoporosis:

- Exercise, a diet rich in calcium, and appropriate mineral and vitamin supplements.
- Bone-strengthening drugs called bisphosphonates.

One drug used to treat osteoporosis that is not recommended for women who have had breast cancer is raloxifene, a selective estrogen receptor modulator. Although it is similar to tamoxifen, a drug commonly used in the treatment of breast cancer, there are no studies supporting raloxifene's use in women with breast cancer.

Are there other alternatives not mentioned here?

Yes. There are alternative treatments not mentioned here, including various hormone preparations, herbs and vitamins. Some of these therapies for menopausal symptoms have been studied and found to be ineffective or potentially harmful, while others have not been studied enough and cannot be recommended yet.

What can I do if alternatives to HRT do not help?

If your menopausal symptoms are particularly troublesome and they are not relieved by any of the alternative approaches listed here, you might want to discuss HRT with your doctor. You will need to talk about many things, including when you had cancer, what kind of cancer you had and how your cancer was treated. You will need to weigh the risk of having your breast cancer return or of developing another cancer in the opposite breast against your present discomfort. If you decide to use HRT, your doctor will probably suggest a low dose and a short treatment period.