External Radiation Therapy: General Information

**Introduction**
Welcome to Radiation Oncology. Whether this is your first experience with radiation therapy or if you have been treated before, you may have fears and/or questions. The staff here will be happy to answer your questions. We hope to make this a pleasant experience for you.

This pamphlet will tell you about radiation treatments. The radiation therapy nurse also will talk to you about your treatment and may give you other pamphlets to read.

Radiation therapy uses high energy x-rays and/or particles to destroy cancer cells. Many patients who have cancer receive radiation therapy. It can be used alone or with surgery or chemotherapy. It can be very effective in destroying many types of cancer. Radiation is also used to shrink cancer tumors that are causing pain, blockage, or bleeding.

**Before Treatment Begins**
You will meet with a doctor who is a radiation oncologist. S/he decides how many radiation treatments you need and the exact area to be treated. Then you will be scheduled for a *simulation*. This is a series of x-rays that helps find the exact area (field) to be treated. This can take as long as 45 minutes. You must lie very still during the simulation.

The person helping the doctor is a radiation therapist. The therapist is specially trained to give you your daily treatment in a precise and safe manner to minimize possible side effects.

The therapist draws the marks on your skin to mark the treatment area. Do not try to wash off these marks. Another section of this pamphlet will tell you how to care for your skin during treatment.

**During Treatment**
Radiation treatments are given five days a week, Monday through Friday (except holidays), at the same time each day. In some cases, treatments are also given weekends and holidays.
You will be the only person in the room when you get your treatment. The therapist will watch you on a television screen from a nearby room. You can talk to and hear the therapist on an intercom.

The treatment itself only takes one to two minutes and is painless. You must lie very still during that time. The treatment is like getting an x-ray. You will not feel anything. You will hear a "whirring" noise when the treatment machine is running.

Some patients will have their blood drawn once a week. If you are an inpatient, this will be done on your ward. If you are an outpatient, you will go to the blood drawing room, near the outpatient entrance, before your treatment. Your doctor checks the blood test results to be sure that your blood counts stay normal during treatment.

**Side Effects (minor)**
Side effects are different for each person. They depend on how much radiation you are receiving and the part of your body that is being treated. Most side effects do not show up until two or three weeks after treatment starts. They are not serious and will go away a few weeks after your treatments stop. Some people do not have any side effects.

There are things you can do to lessen side effects. The radiation oncologist and nurse will tell you more about the side effects of your treatment. This section will tell you about the most common side effects of radiation therapy.

**Fatigue**
Two or three weeks after your treatment starts you may feel more tired than usual. This is normal and will go away a few weeks after your treatment is finished. If you feel tired, try to get more sleep, take naps during the day, and try not to do too much.

**Skin problems**
The skin in the area being treated needs extra care during and after radiation therapy.

After a few treatments, your skin may become red. Then your skin may begin to itch, scale and darken. This is common. These changes are temporary. They will occur only on the skin in the treatment area. In rare cases, the skin blisters and “weeps”. This is more common in skin creases or folds; between the buttocks, in the groin, etc.

Follow these suggestions for taking care of your skin in the treatment area:
• Do not wash off the red dye marks. They are used to make sure that the right area is treated. They tend to fade over time and may have to be redone. The marks can stain your clothing.

• Keep your skin dry.

• Wash your skin with warm water. Pat dry with a soft towel. Do not rub the skin. Do not use soap or shampoo on the treated area, unless your doctor or nurse tells you that you can.

• If your underarm area is being treated, do not use deodorant. It may irritate your skin.

• Do not apply any ointment, cream, lotion, powder, or perfume unless it has been prescribed by your doctor or nurse practitioner. The radiation therapy staff might recommend a cream for the radiation site. The nurse will talk to you and show you how to use it.

• Do not shave the treated area. If you must shave, use an electric razor. Do not use shaving cream or aftershave.

• Wear loose fitting clothing made of soft, non-irritating fabric. This will prevent your clothing from rubbing and irritating your skin.

• Do not put any tape on skin in the treatment area.

• Do not apply heat or cold in any form to the treatment area.

• Avoid exposing the skin, in the treatment area, to the sun during treatment and for the rest of your life. If you expect to be in the sun for more than a few minutes, you must be very careful. Wear protective clothing (such as a hat with a broad brim and a shirt with long sleeves) and use a sunscreen. Ask your doctor or nurse about using sun blocking lotions.

Please ask your doctor or nurse any questions you have about your skin.

Loss of appetite, trouble swallowing, nausea
If you are having radiation to your neck, chest, or stomach you may have these side effects. The following suggestions might help.

• Eat small frequent meals.
- Drink high calorie liquids like milk shakes, instant breakfast drinks, canned supplements, and fruit juices; don't fill up on pop and coffee.
- Add gravy, cheese, butter, and whole milk to recipes.
- If you have a sore mouth or throat eat soft foods and take small bites; avoid citrus fruits.
- Tell your doctor or nurse if your nausea is severe.

**Side Effects (severe)**
Severe side effects are rare. They will be discussed with you before treatment starts.

**Eating Well**
A healthy diet is important during radiation therapy. It helps your body cope with the treatment, keeps your strength up, and helps lessen side effects. Do not try to lose weight during radiation therapy. Eat a variety of foods each day. If you are not sure what a healthy diet is or if you have problems eating, you should talk to a dietitian. If you are an inpatient, the dietitian on your ward will work with you. If you are an outpatient, the dietitian in the Radiation Oncology Department will help you with your questions/concerns.

**Questions/Problems**
You will see the nurse and the radiation oncologist or nurse practitioner once a week after your treatment appointment. This is a good time to discuss any problems you have. If you have questions at any time, please ask the therapist or nurse.

Content approval: Radiation Oncology Service

June 1993
Revised May 1995, September 1997
Revised May 1999
Reviewed April 2001
Revised November 2003, June 2005

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Minneapolis, Minnesota