Treating your skin condition with Broadband ultraviolet B radiation (BB-UVB)

Your doctor has referred you to the Dowling Day Treatment Centre for a course of broad band ultraviolet treatment for your skin condition. This leaflet explains what this treatment involves, including its risks, benefits and alternatives. If you have any questions or concerns, please to speak to a doctor or nurse caring for you.

What is ultraviolet B radiation (UVB)?

Ultraviolet (UV) rays are produced by the sun. Although they can't be seen, they are an important part of sunlight and are grouped into different wavelengths: UVA, UVB and UVC.

UVA rays penetrate skin and cause it to darken or tan. UVB rays are mostly absorbed by the epidermis, which is the top layer of our skin and is responsible for sunburn. UVC rays are absorbed by the Earth's ozone layer, so they do not reach us.

Broad band UVB radiation has been found to be effective in treating skin conditions that are caused by overactive immune cells in the skin, as it reduces their activity. This treatment is often referred to as phototherapy

What can broad band UVB treat?

It is mainly used to treat the skin condition psoriasis, but can also help with eczema and some rarer conditions.

What does treatment involve?

The treatment is given in the Dowling Day Unit by specially trained nurses. You will need to undress and stand in a phototherapy unit, which is a cabinet containing fluorescent tubes that produce UVB rays. Each machine is screened off to make sure your treatment is given in private.

The machine will be turned on and you will be given a calculated dose of broad band UVB. This is then repeated three times per week over several months. You may feel a warm sensation during treatment, but it will not hurt.

Why should I have broad band UVB treatment?

This treatment should help to improve your skin condition. It is often recommended if you have tried ointments and creams without success. However, it is sometimes used in combination with other treatments.

Most patients with psoriasis find their skin has improved after about 30 treatments and remains clear for three to four months.

Are there any other alternatives?

Your doctor has recommended this treatment for you. However, there may be other treatments available, such as narrow band UVB (a specific wavelength of

UVB) and PUVA. PUVA involves making your skin sensitive to light and then exposing it to UVA light.

As well as these treatments, there is a wide variety of creams and ointments that can be used alone or at the same time as your UVB. Oral medications or injections may also be options to consider. Your doctor will explain all the alternatives available to you in more detail. Please make sure you ask questions if you are uncertain.

Asking for your consent

If you decide to go ahead with this treatment, you will be asked to sign a consent form, which confirms that you agree to have the treatment and understand what it involves. You should receive the leaflet, **Helping you decide: our consent policy**, which gives you more information. If you do not, please ask us for one.

On the day of your treatment:

Do not wear perfumes, deodorants, aftershave lotions or other cosmetic products. Some of these contain additives, which make your skin more sensitive to light. This can cause patchy discolouration of the skin and take some months to fade. You can use these after each treatment. For the same reason, please let us know if you have started any **new medications or creams** while having treatment, as some can make your skin more sensitive to light.

On treatment days please do not apply any creams or ointments to your skin before you go in the machine apart from an appropriate moisturiser. You should use a water-based moisturiser such as Aqueous cream, E45 or Diprobase. Do not use oily creams, as these could cause burning or prevent the UVB from being absorbed. We suggest that you moisturise beforehand, as this helps your skin to absorb the ultraviolet light If you are not sure which creams you can use, please ask a member of the day unit staff.

Reduce your exposure to the sun's rays, to minimise the risk of sunburn. Cover up with long sleeved clothes particularly on sunny days; you may want to wear a hat as well. Use a sunscreen with a factor of at least 20 that protects against UVA and UVB rays. Re-apply it regularly. Please do not sunbathe or use a sunbed during the whole course of your treatment.

Let us know if you have a haircut or, for any other reason, any areas of skin become newly exposed during the course of treatment.

Arriving for your treatment

Let the nursing staff know you have arrived. At your first visit you will need to have a light test, which allows us to see your skin's tolerance to UVB. We need this to calculate your safe starting dose. You will need to come back 24 hours afterwards, so we can examine the site where you had the light test. We will then be able to start your treatment.

We usually ask that you remove all your clothing, although you can keep your underwear on if this area of skin is not affected. However, men must either wear underwear or cover their genitalia with a sock or jock strap at all times while in the machine. If you wear underwear, please make sure it covers the same area on each visit. If an area of skin has previously been covered, it may burn if exposed to the UVB treatment. Please bring a light dressing gown to wear while you are waiting for a machine to become available.

The unit has lockers where you can store your other belongings while you are having your treatment. However, we do not have anywhere to store your dressing gown in between treatments, so you will have to take it home and bring it with you on each treatment day. .

What happens during treatment?

The nurse will call you from the waiting room when a machine is available for your treatment. He/she will examine your skin on each visit and ask you some questions before you enter the machine.

We will give you goggles to protect your eyes and tell you how to stand in the machine, to make sure all your affected skin receives the UVB rays. After we have calculated the correct dose for you we will turn the machine on.

The time that you are in the machine will depend on a number of factors such as your skin type (fair or dark) and skin condition. Your starting dose of UVB may only be a few seconds and then gradually built up. Please allow 15-30 minutes for your treatment, to allow time for changing. We will explain this to you in more detail before your treatment and will closely monitor the amount of UVB you receive. We will increase the dose of UVB slightly with each treatment as long as you have tolerated the previous dose.

The machine is quite bright and you may feel warm if you need to stay in the machine for a long time. Let us know if you find it uncomfortable, as we can give your treatment in divided doses.

How often will I need to have this treatment?

This depends on your skin condition but this treatment is usually quite intensive. We generally give treatments three times a week for about 10 weeks. Therefore, you **must** make sure you can commit this amount of time before you start the course of treatment.

We do our best to keep to your appointment time, but occasionally there may be a short queue. Please ask one of the nurses if you are concerned about your waiting time.

What are the risks?

Your doctor or nurse will discuss the possible complications of this treatment with you in more detail, but you need to be aware of the following:

- Your skin can occasionally become itchy and dry.
- Your skin condition could temporarily worsen.
- Your skin may burn, as with any form of sunlight. We will try to avoid this, but some tanning and redness of your skin is likely. Please let us know if your skin does become sunburnt. This usually develops 8-14 hours after your treatment and usually settles within 24 hours.
- Very occasionally patients develop polymorphic light eruption which is an itchy rash due to sunlight.
- As with too much sun exposure, long-term use of UVB (many months to years) may age your skin and increase your risk of developing skin cancer. This increased risk is very slight at first, but gradually increases after about 200-300 treatments. For this reason, we do not give UVB therapy between courses.
- If you do not wear the protective goggles in the machine, you are likely to develop a sunburn type reaction to your eyes within a few hours of treatment which will require urgent medical attention. It may also increase your risk of developing eye cataracts in the future. You may open your eyes during treatments only when you are wearing the protective goggles provided
- If you have rosacea or a history of cold sores which can be aggravated by the sun, we will shield your face during treatment.

It is also important to note that your skin condition may flare up again. If it does you will need further treatments of UVB or other another type of treatment in the future to manage it.

UVB is most suitable for people with extensive psoriasis, eczema and some other rarer skin conditions, but may not be appropriate for you if you have very fair skin, or if your skin condition becomes worse in sunlight.

What do I need to do after my treatment?

You may want to apply your moisturiser or other creams and ointments after your treatment. Cubicles are available for you to do this in. The nurses will be able to help you if needed. You can then get dressed, book your next appointment and go home. UVB tends to cause dryness to the skin so you may find it more comfortable to use your moisturiser regularly, usually twice a day.

If you develop sunburn please treat your skin as you usually would after sunburn. If it is severe, please phone the unit for advice. However this is very rare. Please remember to inform the nurses of any reactions you have from your treatments so that your time in the machine can be adjusted.

Are there any follow-up appointments?

You will be able to book your UVB appointments in advance. Please remember to keep all your appointments and let us know if you cannot attend for any reason. Often you will not need a follow-up appointment. You will be discharged from the unit when your condition has cleared. Alternatively if the treatment is not helping, we will refer you back to your doctor for alternative treatment.

Who can I contact for more information?

If you have any questions or concerns about your treatment, please contact the Dowling Day Unit 020 7188 6275/6290.

Photodermatology Unit St John's Institute of Dermatology February 2008

