

HEAD LICE

This fact sheet is for people who have, or whose children have, head lice.

Head lice are insects that live on the scalp and neck. They may make your head feel itchy. Although head lice may be embarrassing and occasionally uncomfortable, they don't usually cause illness. However, they won't clear up on their own and should be treated promptly.

What are head lice?

Head lice are wingless insects. They are grey or brown, have six legs and are about 2mm long when fully grown.^{1,2}

Lice lifecycle

Head lice live for about three weeks. The female lays up to six eggs a day, which she attaches to the hair near the scalp. The eggs hatch about eight days later.¹ The un-hatched eggs, which are called nits, are a yellow-white colour and are often mistaken for flakes of dry skin or dandruff. Unlike dandruff, nits stick to the hair and are difficult to remove.

In a person with an infestation, there are usually about 10 adult head lice on the scalp at any one time, although there may be many more in some cases.³

How do you get head lice?

Head lice may occur in anyone but are most common in children aged 4-11 because of their close contact with each other at school.^{4,5}

Girls seem to be more prone to head lice than boys. Researchers think this is because girls are more likely to put their heads together when they are playing or working.⁵

The lice are usually passed on via head to head contact. However, head lice cannot survive for long when away from the scalp and those found away from the head are usually dying.

Head lice can be found in all types and lengths of hair. It is a common mistake to associate head lice with dirty hair. They are equally happy living in clean hair.²

Should I keep my child away from school?

There is no need to keep your child off school. Your child is likely to have had head lice for several weeks before you find them, so keeping them off school is unlikely to affect the spread.

What are the symptoms?

Head lice infection can cause an itchy head or neck, or a rash, which is often worse behind the ears or on the back of the neck. However, it is possible to have had head lice for several months before you notice any itchiness, and some people may not report itching at all.

It's important to check your or your child's hair if you have been in contact with someone with confirmed head lice, so that all cases can be treated.

Other signs of head lice infection are:

- nits stuck to the hairs as they grow out
- louse droppings which look like a fine black powder - you will be able to see these on pillows or sheets

If you spot nits or droppings then you will need to make a further investigation.

How can I detect head lice?

Head lice are hard to spot on the hair but can be removed, and then identified, by combing them out. The hair should be combed in sections using either a very fine-toothed comb or, preferably, a special "nit comb" - available from pharmacists.

The hair may be easier to comb if it is wet, or if a few teaspoons of olive oil or hair conditioner are applied to the hair (this should be rinsed off afterwards).⁵ It is important to comb the entire length of the hair from root to tip. After each stroke, the comb should be checked for lice. The hair may also be combed over a piece of paper, a white tissue or a bowl of water, which can then be checked for lice.

If in doubt about what you've found, you can tape a suspected louse to a piece of paper and ask a health professional (a school nurse or pharmacist, for example) to confirm the infection and advise on suitable treatments.

Treatments for head lice infection

Once head lice infection is confirmed there are a number of treatments available:

- insecticides
- thorough and frequent combing ("bug-busting", see below)
- alternative treatments

The insecticides and alternative head lice treatments can be strong chemicals with the potential to cause side effects such as scalp irritation. You should only use them for a confirmed head lice infection.

When it's confirmed that you or your child has head lice, you should check every member of your household and treat them if necessary. Because of the risk of side effects, don't treat the whole family as a preventive measure - only treat someone if you have found a live louse.

Insecticides

Some types of insecticides are available over the counter, such as:

- malathion (eg Quellada M)^{4,6}
- phenothrin (eg Full Marks)^{4,6}
- permethrin (eg Lyclear)^{4,6}

Another type, carbaryl (eg Carylderm), is only available on prescription. Experts recommend that it should be saved for infections that are not cleared by other insecticides.^{4,6}

Insecticides for treating lice are available in lotions, liquids or cream rinses. Shampoos are also available but these are not considered effective.^{4,5}

The most effective insecticides are alcohol-based lotions, but these are not suitable for everyone, particularly people with severe eczema or asthma.⁵

Liquids or cream rinses are water-based and are recommended for young children and for people who get asthma or eczema.⁵ If you are pregnant or breast-feeding you should check with your doctor or health visitor before using insecticides, which should also be avoided for children aged under two.²

You should follow the instructions carefully. Usually the insecticide lotion should be rubbed onto your, or your child's, scalp and hair and left for a minimum of 12 hours before you wash it out.

This will kill the living lice, but may not kill the eggs. The treatment therefore needs to be repeated a week later to destroy any lice that have hatched since the first treatment.

Combing or "bug busting"

This is a method of removing lice with the regular use of a fine-toothed comb (teeth 0.2-0.3mm apart).

Good results require families to be highly motivated and follow the routine closely.³

You can get a "bug-busting" kit from the Community Hygiene Concern charity. The kit contains four specially designed combs (nit combs) and detailed advice. See the *Further information* section below for contact details.

Bug busting kits can also be prescribed by GPs and bought in pharmacies without prescription.² The treatment requires combing at least every four days over a two-week period, so that newly-hatched lice are removed before they can lay eggs.²

Bug busting doesn't involve strong chemicals, and lice cannot become resistant to it. It can also be used for routinely checking the hair for infection. However, there is no good evidence to say how well it works.³

Alternative treatments

These include treatments containing essential oils (including tea tree), herbal extracts or homeopathic tinctures. There is no scientific evidence to show these work, but some people find them helpful.² It is worth bearing in mind that natural chemicals, such as tea tree oil, can cause side-effects, such as scalp irritation.

After treatment

Whichever treatment is used, a follow-up check using a nit comb should be carried out a few days after the course of treatment.

Finding eggs doesn't always mean that the treatment has failed - the lice may have been killed and you may just be seeing hatched egg cases. And even if a live adult louse is found, this may be due to re-infestation rather than failure of the treatment.

However, a treatment does sometimes fail - usually because of incorrect or inadequate use of insecticide. It is also possible for lice to develop resistance to one or more insecticides.⁴ If this happens, an alternative method, or a different insecticide, may be needed.

A school nurse, pharmacist or GP can advise which is the best insecticide to use in your area depending on the local pattern of resistance.

Prevention

The best way to prevent head lice spreading is to check your whole family's scalps regularly and treat them as soon as live lice are found.

To minimise head lice spreading to other people, and to prevent you or your child getting them again after treatment, it is essential to let every person you or your child has had contact with know about their possible exposure, so that they can be checked and treated if necessary. This includes, where relevant, schools and nurseries and other family members including relatives such as grandparents.

Head lice repellents have not been shown to be useful and are not recommended.^{2,4,5} There is no need to delouse bed linen, towels or hats. Head lice do not survive away from the scalp and can only pass from person to person by close, head to head contact.²

Further information

- Community Hygiene Concern
020 7686 4321
www.chc.org
www.nits.net

References

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