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Head Lice: What Parents Need to Know

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Head lice are a common problem, especially among school-aged children and their families. The lice can attach to the hair of anyone's head. It doesn't matter if the hair is clean or dirty. Head lice are also found worldwide in all different places, such as in homes or schools or the country or city. It doesn't matter how clean, dirty, rich or poor the place or person is.

Though head lice may be a nuisance, they don't cause serious illness or carry any diseases. Head lice can be treated at home, but it's important to check with the doctor first. (See "Head Lice Medicines," below).

Read on for information to help you check for, treat and prevent the spread of head lice.

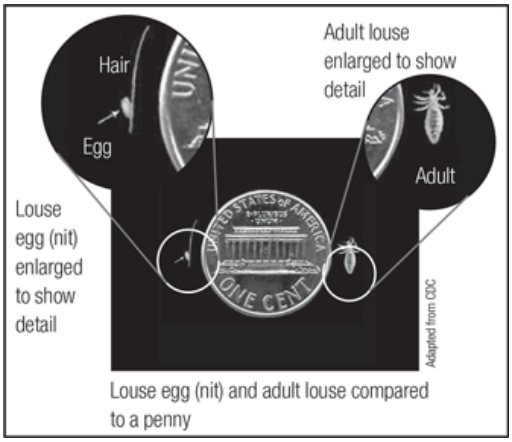
What are head lice?

Head lice are tiny bugs about the size of a sesame seed (2–3 mm long [mm stands for millimeter]). Their bodies are usually pale and gray, but their color may vary. One of these tiny bugs is called a louse.

Head lice feed on small amounts of blood from the scalp. They can't survive more than 1 day without a blood meal.

What are nits?

Lice lay and attach their eggs to hair close to the scalp. The eggs and their shell casings are called nits. Lice eggs are oval and about the size of a knot in thread (0.8 mm long and 0.3 mm wide) and usually yellow to white.



Louse egg (nit) and adult louse compared to a penny

Some nits may blend in with some people's hair color, making them hard to see, and are often confused for dandruff or hair spray droplets. Nits attach to the hair with a sticky substance that holds them firmly in place. After the eggs hatch, the empty nits stay on the hair shaft.

What is the life cycle of head lice?

Head lice live about 28 days. They develop in 3 phases: egg (also called a nit), nymph, and adult louse.

- **Egg or nit.** Eggs or nits hatch in 7 to 12 days, depending on the surrounding temperature. Eggs are usually found within 4 to 6 mm of the scalp and do not survive if they are farther away.
- **Nymph.** The nymph looks like an adult head louse but is much smaller (about the size of a pinhead [1.5 mm]). Nymphs become adults about 9-12 days after hatching.
- **Adult louse.** An adult female louse can lay up to 10 eggs a day. It takes only about 12 to 14 days for newly hatched ıgs to reach adulthood.

The cycle can repeat every 3 weeks if head lice are left untreated.

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How common are head lice?

Head lice are most common in preschool- and elementary school–aged children. Each year millions of school-aged children in the United States get head lice. However, anyone can get head lice. Head lice are found worldwide.

How do head lice spread?

Head lice are crawling insects. They cannot jump, hop, or fly. The main way that head lice spread is from close, prolonged head-to-head contact. There is a very small chance that head lice will spread by sharing items such as combs, brushes, hats and sports helmets.

What are symptoms of head lice?

Itching on the areas where head lice are present is the most common symptom (/English/tips-tools/Symptom-Checker/Pages/symptomviewer.aspx?symptom=Lice+-+Head). However, it may take up to 4 to 6 weeks after lice get on the scalp before the scalp becomes sensitive to the lice saliva and begins to itch. Most of the itching happens behind the ears or at the back of the neck. Also, itching caused by head lice can last for weeks, even after the lice are gone.

How do you check for head lice?

Regular checks for head lice are a good way to spot head lice before they have time to multiply and infest (are present in large numbers) your child's head.

- Seat your child in a brightly lit room.
- Part their hair.
- Look for crawling lice and for nits on your child's scalp a section at a time.
- Live lice are hard to find. They avoid light and move quickly.
- Nits will look like small white or yellow-brown specks and be firmly attached to the hair near the scalp. The easiest place to find them is at the hairline at the back of the neck or behind the ears. Nits can be confused with many other things such as dandruff, dirt particles or hair spray droplets. The way to tell the difference is that nits are firmly attached to hair, while dandruff, dirt or other particles are not.
- Use a fine-tooth comb (such as a louse or nit comb) to help you search the scalp section by section.

What is the comb-out method for lice?

The comb-out method can be used to help check for nits and head lice or to help remove nits and head lice after head lice treatment. However, the comb-out method usually doesn't work on its own to get rid of head lice.

Here is how you use the comb-out method:

- **Step 1:** Wet your child's hair.
- **Step 2:** Use a fine-tooth comb (louse or nit comb) and comb through your child's hair in small sections.
- **Step 3:** After each comb-through, wipe the comb on a wet paper towel. Examine the scalp, comb, and paper towel carefully.
- **Step 4:** Repeat steps 2 and 3 until you've combed through all of your child's hair.

How do you treat head lice?

with your child's doctor before beginning any head lice treatment (/English/health-issues/conditions/from--animals/Pages/Head-Lice-Treatment-Myths-Realities.aspx). The most effective way to treat head lice is with head lice medicine. After each treatment, using the comb-out method every 2 to 3 days for 2 to 3 weeks may help

remove the nits and eggs.

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Head lice medicine should be used only when it is certain that your child has living head lice. Remember, check with your child's doctor before starting any head lice medicine. Also, when head lice medicines are used, it is important to use them safely as directed.

Here are some safety guidelines for lice treatments:

- **Follow the directions** on the package exactly as written.
- **Never let children apply the medicine.** Medicine should be applied by an adult.
- **Always rinse the medicine off over a sink** and not during a shower or bath, so the medicine doesn't run off the head onto other areas of skin. Place your child's head over a sink and rinse the medicine off with warm water (not hot water).
- **Never place a plastic bag on a child's head.**
- **Do not leave a child alone** with medicine in his or her hair.
- **Store medicine in a locked cabinet**, out of sight and reach of children.
- **Check with your child's doctor before beginning a second or third medicine.** Your child may just need to repeat the same medication, or switch to a new one.
- **Ask your child's doctor if you have any questions** or if treatments you have tried have not gotten rid of lice.

Warning about dangerous home remedies for lice

Never use dangerous products like gasoline or kerosene or medicines made for use on animals! Also, do not use home remedies, such as petroleum jelly, mayonnaise, tub margarine, essential oils or olive oil, because no studies prove they work.

What head lice medicines are available?

Check with your child's doctor before beginning any treatment. See chart, below, for a list of head lice medicines approved by the U.S. Food and Drug Administration.

Head Lice Medicines	
Permethrin lotion (1%) Brand name products: Nix, Elimite and Acticin	• No prescription needed. • Apply to shampooed and towel-dried hair; then rinse off after 10 minutes. Do not shampoo for 24-48 hours afterward. • Kills lice; does not kill lice eggs. • Retreatment is recommended between days 9 and 10 if live lice are seen. • Approved for use in children 2 months and older.

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Pyrethrin-based product (shampoo or hair mousse) Brand name products: RID, A-200, Pronto, R&C, Triple X and Licide	• No prescription needed. • Apply to dry hair and rinse off after 10 minutes. Do not shampoo for 24-48 hours afterwards. • Kills lice; does not kill lice eggs. • Retreatment is recommended between days 9 and 10. • Approved for use in children 2 years and older.
Ivermectin lotion (0.5%) Brand name product: Sklice	• No prescription needed. • Apply to dry hair and rinse off after 10 minutes. Do not shampoo for 24-48 hours afterwards. • Kills lice; does not kill lice eggs. However, prevents newly hatched lice from living. • Only 1 application is needed. • Do not use veterinary formulations of ivermectin. • Approved for use in infants and children 6 months and older.
Malathion lotion (0.5%) Brand name product: Ovide	• Prescription needed. • Apply to dry hair and rinse off after 8–12 hours. Do not shampoo for 24-48 hours afterwards. • Kills lice and lice eggs. • A second treatment is recommended in 7–9 days if live lice are seen. • Approved for use in children 6 years or older. • Strong odor. • Flammable.
Spinosad topical suspension (0.9%) Brand name product: Natroba	• Prescription needed. • Apply to dry hair and rinse off after 10 minutes. Do not shampoo for 24-48 hours afterwards. • Kills lice and lice eggs. • A second treatment is recommended in 7 days if live lice are seen. • Approved for use in children 6 months of age and older.

Ivermectin 3-mg tablets	• Prescription needed. • Use only when other medications have failed. • A second treatment is recommended in 9-10 days if live lice are seen. • Can be used at any age, as long as weight is at least 33 pounds. • Do not use veterinary formulations of ivermectin. • Approved for use in adults for head lice, and used in children for other infections.

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What else do I need to know about treating head lice?

- **You may want to wash your child's clothes, towels, hats, and bed linens in hot water and dry on high heat** if they were used within 2 days before head lice were found and treated. You do not need to throw these items away. Items that cannot be washed may be sealed in a plastic bag for 2 weeks or dry-cleaned..
- **Do not spray pesticides in your home.** They can expose your family to dangerous chemicals and are not needed when you treat your child's scalp and hair properly.
- **All household members and close contacts should be checked** and treated for head lice if necessary.

About school "no-nit" policies

Some schools have "no-nit" policies stating that students who still have nits in their hair cannot return to school. The American Academy of Pediatrics and National Association of School Nurses discourage such policies and believe a child should not miss or be excluded from school because of head lice.

Remember

Head lice don't put your child at risk for any serious health problems. Products should be used only if those products are safe. If your child has head lice, work quickly but safely to treat your child to prevent the head lice from spreading.

More information

- Head Lice Treatment Myths & Realities (/English/health-issues/conditions/from-insects-animals/Pages/Head-Lice-Treatment-Myths-Realities.aspx)
- Controlling Head Lice & Reducing Stigma (/English/news/Pages/controlling-head-lice-and-reducing-stigma.aspx)
- Lice-Head (/English/tips-tools/Symptom-Checker/Pages/symptomviewer.aspx?symptom=Lice+-+Head) (KidsDoc Symptom Checker)
- Head Lice (https://publications.aap.org/pediatrics/article/doi/10.1542/peds.2022-059282/189566/Head-Lice?searchresult=1) (AAP Clinical Report)
- Head Lice Prevention & Control (https://www.cdc.gov/parasites/lice/head/prevent.html) (CDC)
- Head Lice Management in Schools (https://www.nasn.org/nasn-resources/professional-practice-documents/position-statements/ps-head-lice) (National Association of School Nurses)

About Dr. Nolt

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The information contained on this Web site should not be used as a substitute for the medical care and advice of your pediatrician. There may be variations in treatment that your pediatrician may recommend based on individual facts and circumstances.

The Many Benefits of Good Sleep

A good night's sleep allows your brain and body to develop in many ways. Kids and teens should get more sleep than adults. Getting good sleep can provide the following benefits:

Get Fully Recharged!

Your body uses sleep as fuel to gain energy. If you get good sleep, you will have more energy to take on your daily activities.

Helps You Be More Creative

Better sleep helps your brain make connections and solve problems, which fuels creativity. Lack of sleep causes your brain to struggle to form ideas and perform at its best.

Good Mood, Less Stress

Sleep stabilizes mood and stress. Sleep problems can cause more irritability, and make you more prone to anxiety or depression.

Improves Brain Functioning

Good sleep improves your ability to focus and be attentive. It helps you to think more clearly, and helps to improve brain functions such as memory, decision making, effort, and motivation. This can help you perform better at school or work.

Lowers Risk Of Serious Health Problems

Research has shown that poor sleep can increase your risk of illness and disease such as type 2 diabetes or heart disease. Studies also show that good sleep can increase your life span.



Helps Control Weight

Poor sleep has been linked to weight gain and obesity in children, teens, and adults.

Boost Immune System

Getting good sleep can make your immune system stronger. Good sleep has been found to help immune system T-cells fight infection, which helps you prevent illness and recover from illness.

Helps You Grow

Sleep helps you grow. Your brain releases a growth hormone when you're asleep. It promotes development during puberty, as well as growth spurts in early life.

Overall, good sleep helps you to live a longer, healthier, and more fulfilling life!

Follow Recommended Sleeping Hours

Toddler (1-2 yrs. old)	11-14 hours a day
Preschool (3-5 yrs. old)	10-13 hours a day
School-age (6-12 yrs. old)	9-12 hours a day
Teen (13-18 yrs. old)	8-10 hours a day

Do

- Practice relaxation or stress relief activities before bed
- Follow a fixed sleep schedule
- Create a calming sleep environment
- Avoid daytime naps

Don't

- Drink coffee or drinks with caffeine before sleeping
- Eat heavy meals
- Go to bed hungry
- Use electronics at bedtime

Tips To Improve Sleep

Experiment with different strategies to achieve good sleep. Below or some tips to help get you started.

Routines, Activities, And Coping Skills

Be more active – During the day try to exercise for 30 minutes or more at moderate to high intensity.

Do relaxing exercises – Quiet down your thoughts by meditating, deep breathing, visualizing relaxing places, progressive muscle relaxation, or other calming exercises.



Consistent sleep schedule – Stick to the same bedtime and wake up time each night; this helps you keep your body & internal clock on track. Avoid daytime naps.

Regular bedtime rituals – Help your body recognize when it's time to sleep; do calming things at the same time every night (read books, listen to music, warm bath or shower, etc.).

Manage your worries – Relieve stress and solve concerns before bedtime by keeping a diary where you can release what's bothering you at night.

Essential oils – Try lavender, chamomile, valerian, or clary sage.

Soothing music or audio books – Use a Bluetooth speaker so you can avoid being on your device at bedtime.

Guided meditations – There are various apps or audio tracks found online or on YouTube. You can also try written scripts that can be read by a caring adult.

Eating Habits

Avoid caffeine – Coffee, soda, energy drinks, or any other caffeinated drink after 4:00pm.

Eat on time – Eat meals at the same time each evening, and avoid eating heavy meals and snacking late at night. Also, avoid going to bed hungry.

Sleep-enhancing food and drinks – Try almonds, walnuts, kiwi, fish, turkey, or milk.

Tea – Try chamomile, passionflower, or other caffeine-free herbal teas.

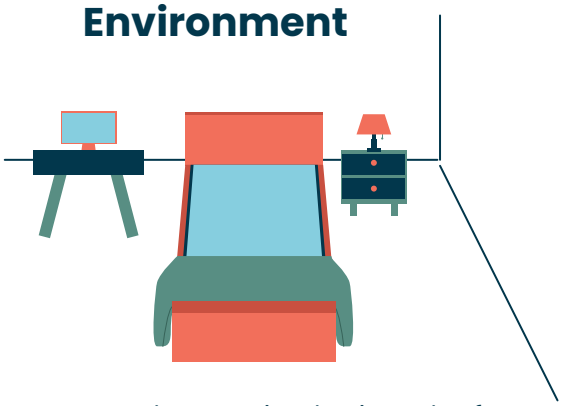
How Long Should You Sleep?



- **Children age 5-12:** 9-12 hours
- **Teens age 13-19:** 8-10 hours

**If you have consistent trouble falling or staying asleep at night, or trouble staying awake during the day you should consult with your doctor.

Environment



- Do not use electronic devices before sleeping (phones, laptops, tablets, video games). Turn off all devices at least 30 minutes before bedtime.
- A cool, dark, quiet, calm room is ideal.
- Only use your bed for sleep; not for relaxing, watching TV, playing video games, or doing homework.
- Get comfortable with soft pillows, blankets, or stuffed animals. Some may enjoy a weighted blanket.
- Dim the lights, or use a night light if it provides comfort.