Lice (Pediculosis)

Lice are tiny insects that live and feed on mammals and birds. They are part of nature and one of several species of parasites that can survive only by feeding and breeding on human hosts. There are three types of lice commonly seen: the head louse, body louse, or pubic louse “crab.” The most common is head lice.

Head lice (pediculosis capitis) are about one millimeter in length. They hide in human clothing and bedding and inhabit and breed in human hair. They bite the scalp to feed on human blood. Their saliva provokes intense itching which is the principal medical symptom. Rarely will head lice live on other areas of the body. Female lice live for 1 to 3 months and will die if separated from a human host for more than 24 hours. A female louse lays up to 7-10 eggs per day. The eggs or nits are < 1 millimeter in diameter and shiny in appearance. Nits are deposited on hair shafts emerging from the skin and hatch in 6 to 10 days. Lice thrive in clean or dirty hair. Lice do not jump, fly, or use pets as hosts. Nits are cemented securely to the hair shaft and are difficult to dislodge. Dandruff or hair spray residue can be mistaken for nits.

Symptoms of head lice include sudden, intense itching on the scalp or behind ears, tiny red bite marks or larger sores and scabs from scratching. These lice thrive and spread when people work and live in close proximity to each other, particularly when there is mingling of personal items and clothing. Do not share hair accessories. If the infestation is not treated, the lice will continue to multiply and will eventually spread to the eyebrows and eyelashes. Each new cycle will produce an intensification of symptoms.

How are lice infestations treated?

The main objective in treatment is to kill all the lice, including the eggs/nits: Application of topical insecticides containing Permethrin, which comes in lotion or shampoo forms. When in doubt ask the pharmacist for assistance. Over the counter preparations that work effectively include Nix, RID, A-200, and Pronto shampoos to mention a few. These preparations will actively kill hatched lice but not all eggs/nits. Since the incubation period of most lice is 7 to 10 days, the lotions will need to be reapplied in 7 to 14 days to kill newly hatched eggs/nits.

Self-Care Measures:

- Follow the instructions of your health care provider and use the medication as directed.
- Anyone who sleeps in the same bed should be treated for lice, even if no lice or eggs are found.
- Clothing, bedding, and towels used within 2 days before treatment should be washed in hot water and dried in an electric dryer on the hot setting. Dry cleaning is also effective.
- You can use a vacuum to clean furniture, carpet, and car seats. Items that cannot be washed or vacuumed can be sealed inside a plastic bag for two weeks. Items that the person used more than two days before treatment are not likely to be infested because head lice cannot survive off the body for more than 48 hours.
- You do not need to have your home sprayed for lice.
- Do not shave heads. This drastic measure is not necessary.

Treatment Options:

- Permethrin (Nix, Rid) or Pyrethrin (A-200, Pronto). These are over the counter (pediculicide) products.
Topical pediculicides should be applied according to the package instructions. Basic principles for treatment include:

- Hair conditioners should not be used prior to application; these products may result in reduced effectiveness.
- Rinsing of topical pediculicides should be performed over a sink rather than in a shower or bath to limit skin exposure.
- Rinsing with warm water is preferred over hot water to minimize absorption into blood stream.

- **Wet-combing** – Wet-combing is a way to remove live lice from the hair with careful and repeated combing. It is a good option for treating if you want to avoid using insecticides. Wet-combing must be repeated multiple times over a period of a few weeks.
  - Before using the lice comb, use a regular brush or comb to remove tangles. This can be done while the hair is wet or dry. Wet the hair and add a lubricant, such as hair conditioner or cream rinse, vinegar, or olive oil.
  - Place the lice comb at the top of the head, touching the scalp. Pull the comb through the hair from roots to ends. After each stroke, carefully examine the comb for lice or eggs.
  - The combing session should take 15 to 30 minutes, depending how long and thick the hair is. Comb every three to four days for two weeks AFTER you find any large, adult lice.

- Daytime antihistamine such as Claritin/loratadine, Zyrtec/cetirizine and Allegra/fexophenadine may be purchased over the counter at a local store. Follow dosing per package instructions.
- At bedtime, use an antihistamine, such as Diphenhydramine (Benedryl) per package dosing instructions. Do not exceed 300 mg in 24 hours. May cause drowsiness, use caution while driving.
- Cetaphil Skin Cleanser (see attachment)

The following organizations also provide reliable health information.

- National Library of Medicine
- Center for Disease Control and Prevention
  ([www.cdc.gov/lice/](http://www.cdc.gov/lice/))

Please call to make an appointment at the Student Health Center or with your PCP or go to Urgent Care or the Emergency Department if your concerns do not improve with conservative self-care treatment or if you have worsening symptoms.

Please know your health problem and allergies. Information contained in this handout is for educational purposes only. It is not a substitute for evaluation and treatment by a Healthcare professional. As new and updated information becomes available, the content may change. Please contact your Healthcare Provider or the SHC Triage Nurse at 570-389-4451 with any questions.
DIRECTIONS FOR USE OF THE CETAPHIL LICE TREATMENT –

· Cetaphil Gentle Skin Cleanser
· Applicator bottle, such as the plastic bottles hair dye comes in
· A regular hair comb (must be fairly sturdy, as the cleanser is very thick)
· A wide toothed comb (for thick or longer hair, to keep it untangled)
· Towel
· Hair clips for sectioning hair

Method
Start with dry hair and cover your shoulders with a towel. (Cetaphil is very thick so you won't have much dripping) Use a good metal lice comb to comb out as many nits as possible before you start. Section your hair off in very small sections; it's extremely important that you coat every strand of hair, and apply the Cetaphil directly to your scalp at each part you make in your hair so that you lessen the chance of missing even ONE louse on your head!
Use Cetaphil liberally and massage, massage, massage it in. Even ONE louse left uncoated may survive to reproduce.

Once you are sure you have covered every strand of hair and every inch of scalp, use a regular (but sturdy comb) to begin combing out the excess lotion. You may need to use a wide toothed comb first, if your hair is thick or very long. Comb until you have removed as much of the excess Cetaphil as possible. Once that is done, use a hair dryer to dry your hair. (Use the most powerful hair dryer you have, as the drying process can take up to three times longer than drying after a shower – this is the only really time consuming part of the process, as the Cetaphil takes much, much longer to dry than water.)

What will happen is that the Cetaphil will dry on your head, hair and most importantly on the lice, cutting off their source of oxygen, therefore smothering them. (In a sense, they will be 'shrink wrapped'.) Lice can literally survive for hours without breathing, so this must be left on the hair for a minimum of 8 hours. This can be done before bed, so that the 'smothering' process can take place during sleep. You must make SURE that your hair is completely dry in order for the lice to be totally encased in the dried Cetaphil, and therefore be unable to breathe.
After 8 hours, wash and dry your hair normally. Use the metal lice comb once again, to comb out any surviving live nits. For best results, you must repeat this treatment three times in one-week intervals to make sure that newly hatching lice do not survive to begin the hatching/reproducing cycle again.