
2023

A Guide to Bed Bugs



**Dunlap Community
School District #323**

Every Student. Each Day.

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What are Bed Bugs?

Bed bugs are small, brownish, flattened insects that feed on the blood of people. Although the bite does not hurt at the time, it may develop into an itchy welt similar to a mosquito bite. Bed bugs do not transmit disease, but they can cause significant itchiness, anxiety, and sleeplessness. Bed bug habitations can be difficult and expensive to control. Usually, bed bugs will hide during the day and only come out to feed during the night. Unlike head lice, they do not live on a person. However, they can hitchhike from one place to another in backpacks, clothing, luggage, books, and other items.



It is fairly difficult [to find bed bugs](#), but the first sign that'll manifest is the sudden presence of strange bites/rashes. Other signs of infestation include reddish-brown stains on bedding from bed bug excrement, musty odors on bedding, bed bug shells, eggshells, or shed skins in cracks in the wall, torn wallpaper, picture frames, or electrical outlets, or live bed bugs themselves (Central Ohio Bed Bugs, 2023).



Bed Bugs on a Mattress



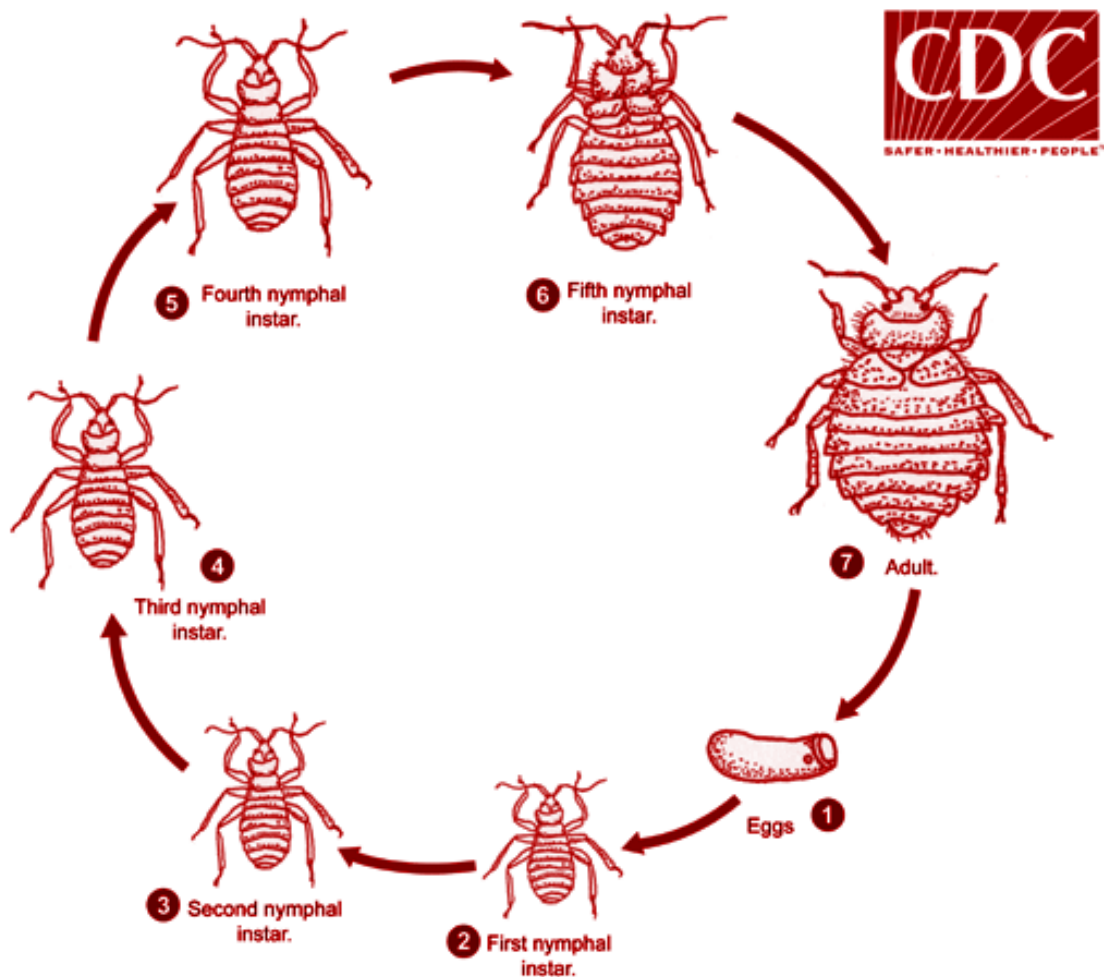
Bed Bug Bites

Images from Peoria Health Department <https://www.pcchd.org/160/Bed-Bugs>

Actual bed bug infestations in schools are uncommon. More commonly, a few bed bugs will hitchhike to school from an infested home by hiding in a student's clothing or backpack. Bed bugs that hitch a ride into the school in one student's backpack could be carried home by another student, making the school a potential hub for bed bug spread (Michigan Bed Bug Working Group, 2010).

Life Cycle of a Bed Bug

Bedbugs go through five nymphal (immature) stages after hatching from the egg and before molting one final time to an adult. They require at least one blood meal at each stage. Adults may feed many times throughout their lifespan, every 3-7 days varying with temperature and other factors, with females requiring a blood meal to produce egg batches. Males may feed less frequently. Nymphal stages last from about 4 days to 24 days based on temperature and other environmental conditions. Adults may live for more than a year. Under optimal conditions, the cycle from egg to egg can take place in under 5 weeks. However, the insects can go for long periods (up to one year under optimal conditions) between blood meals. Females must mate to lay eggs. Mated females lay eggs singly, cementing them to surfaces in crevices and protected areas away from but near a host sleeping area. They average 3-5 eggs per day but may lay as many as 12, producing over 500 eggs in their lifetime. As with other stages, the eggs are very durable and can remain viable for weeks under harsh environmental conditions.



Feeding

The nymphs and adults locate hosts using heat and carbon dioxide sensors, and recognize human hosts through olfactory (smell) receptors on their antennae and mouthparts. Bed bugs normally feed late at night or early morning when the host is in deepest sleep. Most people are unaware when being fed upon – the bed bug is stealthy and its saliva contains desensitizing agents that prevent the host from feeling its mouthparts penetrate the skin. The bite sites are usually small, pinprick-sized lesions that may or may not become inflamed. Reaction to bed bug bites varies from person to person. Most people show no reaction the first time they are bitten, but subsequent bites may develop into welts that itch. Some people react severely with welts that itch for weeks, and individuals prone to keloid scarring may be affected dramatically. They feed for 3-15 minutes and then leave the host. It is rare to actually find bed bugs feeding. Once in their protected hiding spots, the blood meal is digested. During this process, they will defecate, leaving reddish brown spots that are characteristic of bed bug infestations.

Prevention

- Avoid storing students' jackets, backpacks and personal belongings in close contact with each other
- Limit items that students transport back and forth to school
- Reduce classroom clutter, cardboard, and soft seating
- Limit students bringing blankets, pillows, and stuffed animals to school
- DO NOT apply pesticides on school property. By law, only licensed applicators can apply pesticides (even ready-to-use products like sprays) in schools, and in compliance with the District Pest Management policy.

Guidelines

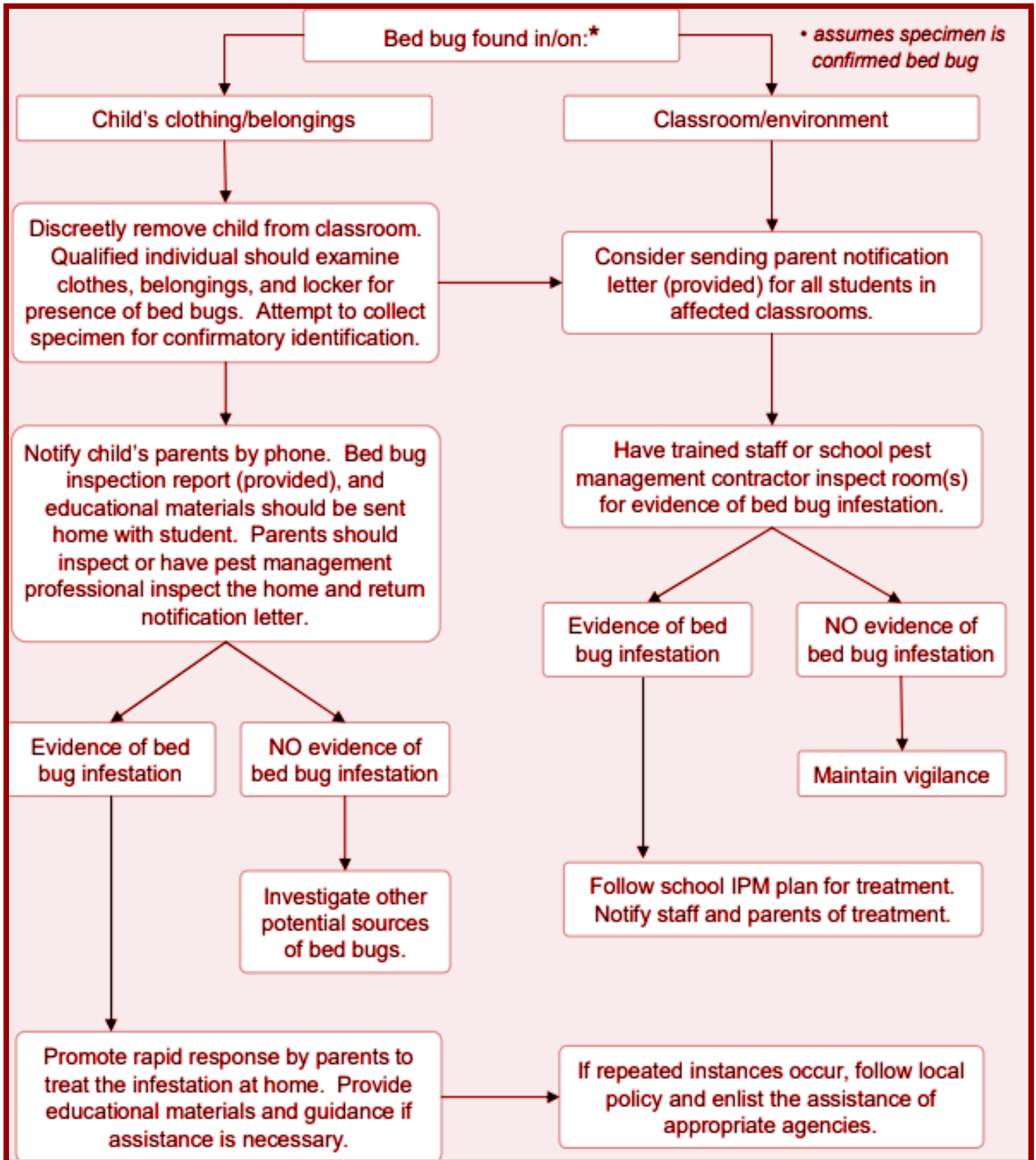
If a bed bug is found on a student, it may indicate that the student has bed bugs at home. However, bed bugs can crawl onto or off of a person or their belongings at any time, so it is also possible that the bed bug was brought to school by someone else. If a suspected bed bug is found on a student or a student's belongings, the following procedures should be followed:

1. Collect specimens. Place the specimen in a plastic bag and seal with tape. Please note that pictures aren't able to be analyzed. An actual specimen is necessary. Remember that finding a confirmed bed bug on a child or child's belongings does not necessarily mean the child's household is infested.
2. The school principal or designee will contact Pest Control:

American Pest Control
309-565-4251
14003 West Farmington Road
Hanna City, Illinois 61536

3. If the specimen is identified as a bed bug, the principal or designee and school nurse should be notified.
4. With a confirmed bed bug, a student should **not** be sent home or isolated from other students.
5. Notify the parent.
6. The student should be temporarily removed from the classroom so that the school nurse or a qualified individual can perform an inspection of the student's clothing and other belongings including: hat, shoes, jacket, backpack, and school supplies.
7. Without drawing significant attention to the student, check the areas where the student sits or where affected belongings may have been placed for extended periods of time.
8. Once it has been confirmed that a bed bug has been found in the classroom, the classroom should be thoroughly vacuumed in the areas where student belongings are kept using a vacuum with a disposable bag. The room should be vacuumed on the day the insect is found. The bag should be disposed of immediately after use.
9. The Principal or Designee should notify the affected class or classes with notification letter provided at the end of the document.
10. Pest management will be provided by professional pest control services in accordance with the District pest management plan.

Flowchart



(Michigan Bed Bug Working Group)

Home Infestation

When a student is dealing with an infestation at home, it is important to be sensitive to their problem. Although bed bugs have nothing to do with cleanliness or socioeconomic status, there is still a stigma that can come with having bed bugs. As a result, parents may be hesitant to admit to having bed bugs, and students may not want others to know they have an infestation at home. Students living in an infested home may also feel anxious or tired during the school day.

Schools should work with the parents of any student living in an infested home to develop strategies for preventing the further spread of bed bugs.

1. Determine if the infested home is being treated. Home remedies and do-it-yourself treatments are usually insufficient and could cause negative health effects or produce potential hazards in the home.
2. If a parent lacks the financial resources to hire a pest management professional, the school counselor or nurse can connect them with local resources.
3. In an infested home, parents should store their child's freshly laundered clothing in sealed plastic bags until they are put on in the morning. This prevents bed bugs from hiding in the clothing and being carried to school.
4. Backpacks, lunchboxes, and other items that travel back and forth to school can also be inspected daily and stored in sealed plastic containers at home to prevent bed bugs from getting into them.
5. At school, the student could be provided with plastic bags or bins in which to store their belongings in order to prevent any bed bugs from spreading to other students' belongings.
6. If bed bugs are finding their way into the school, consider notifying the affected classes.
7. Continue to use these measures until successful treatment of the home has been verified.

Resources

[Central Ohio Bed Bugs](#)

[University of Kentucky Entomology](#)

[Environmental Protection Agency
Bed Bug Guidance for Parents](#)

Illinois Department of Public Health

Phone: 217-782-583

[Prevention and Control of Bed Bugs](#)

[Michigan Bed Bug Resources](#)

[Michigan Manual for the Prevention and Control of Bed Bugs](#)

[The Ohio State University Bed Bugs](#)

Sample Parent Communication

Dear Parent or Guardian,

I am writing to inform you that a bed bug was found in your child's classroom. While bed bugs are a nuisance, their bites are not known to spread disease. Bed bugs are usually active at night and feed on human blood. The bite does not hurt at first, but it may become swollen and itch, much like a mosquito bite. We encourage families to watch for clusters of bites, usually in a line, on exposed areas of the body.

Bed bugs are never home grown, but rather always imported into your home from somewhere! The source of bed bugs often cannot be determined, as bed bugs may be found in many places including hotels, planes, stores, and movie theaters.

Even though it is unlikely for bed bugs to infest a school, **(School Name)** will conduct an inspection and, if needed, will implement an integrated pest management plan in the area where the bed bug was found. **(School Name)** will continue to work to identify bed bugs, provide thorough inspections of classrooms, and have licensed pest control specialists assist with pest management.

If you have medical concerns for you or your child, please contact your doctor. Contact your physician or public health nurse for proper care and treatment of bed bug bites. If you have any questions regarding bed bugs in your school, please contact the Principal **(add principal's name and contact info here)**. Note: If you have any questions regarding bed bugs found in your home, contact your local health department. Sincerely, **(Principal's Signature)**

Sample Bed Inspection Communication

Dear Parent,

Today, a bed bug was found on your child or in your child's belongings. While this does not necessarily mean that the bed bug was brought to school by your child, it is important to your child's health and to the school community that you inspect your home for signs of bed bugs.

Enclosed you will find information about bed bugs and an identification guide to help you with your inspection. Once you have inspected your home, please fill out the form below and return to the school office.

Sincerely,

School Administration

I have been informed that a bed bug was found on my child at school. I understand that bed bugs may pose a threat to my child's well-being and to the greater school community. I have read and understood the educational materials provided to me regarding bed bugs, and have:

- Carefully checked my family and home for signs of bed bug infestation and/or
- Hired a pest management professional to check my family and home for signs of bed bug infestation.

After completing a careful inspection, I certify that to the best of my knowledge:

- I or a pest management professional found signs of bed bugs in my home, and I will take the following actions to eliminate this infestation:

- I or a pest management professional did not find signs of bed bugs in my home at this time. If I find evidence of bed bugs in the future, I will notify the school immediately and take action to address the infestation. I understand that bed bugs can be spread to other homes if they are brought to school in backpacks, clothing, and other belongings. I understand that if bed bugs are repeatedly found on my child, that the school may take additional actions to protect the school community from bed bugs.

Signature _____ Date _____

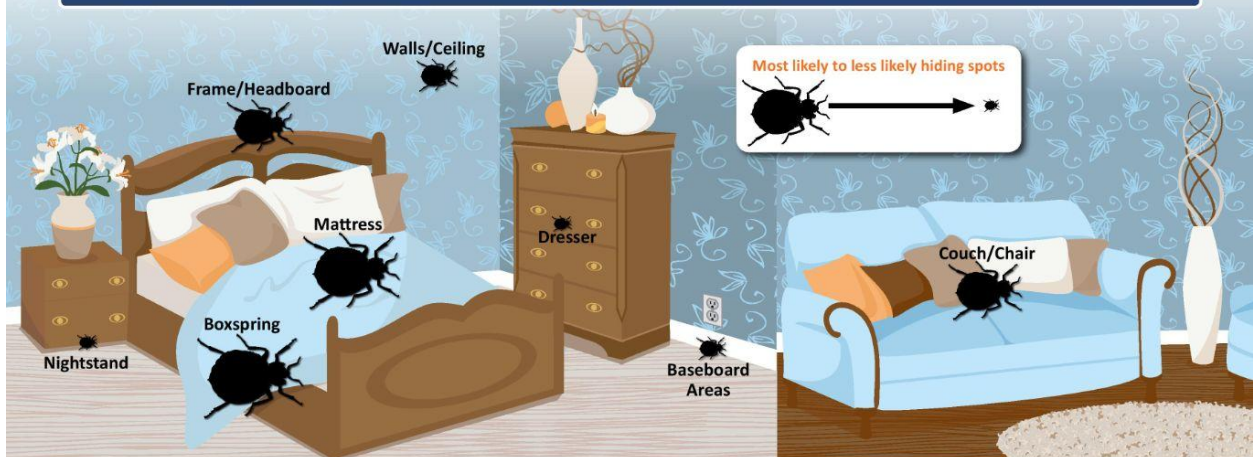
BITE BACK!

YOU CAN CONTROL BED BUGS.

Bed bugs are a widespread problem in Illinois and around the world. Here's what you can do to protect yourself.

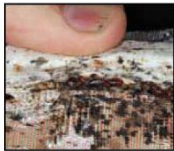
WHERE TO LOOK: BED BUG HIDING SPOTS

Bed bugs hide in cracks and tight spaces within 6 to 8 feet of the sleeping areas – above, under and around.

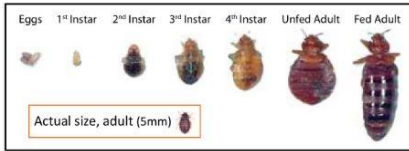


WHAT TO LOOK FOR.

Dark brown or black spots



Bedbug life cycle



Pictures courtesy of J.L. Obermeyer, Purdue University and Dr. D. Miller, Virginia Tech University

WHAT ABOUT BITES?

The only way to be sure that you have bed bugs is to find the bug. Why? Because their bites look like those of other insects or skin problems, and many people don't react to their bites at all.



Dirty living conditions DO NOT attract bed bugs, but cleaning regularly and removing clutter will help you see and better control them. Always be aware of your surroundings and take action quickly when a problem is found.

How You Get Bed Bugs



Travel



Used Furniture



Guests

Top 4 Things You Can Do To Stop Bed Bugs

- Reduce clutter, especially in bedrooms.
- Look often for signs in sleeping areas.
- Put bedding and other items in the clothes dryer using high heat for at least 30 minutes.*
- Report problems quickly to landlord and/or an experienced pest control operator.

*Heat is one of the best treatments for bed bugs because it kills all bed bugs, eggs to adults.



IMPORTANT! Bed bug bombs and foggers do NOT work for controlling bed bugs.



State of Illinois
Illinois Department of Public Health

For Additional Information Contact:

Illinois Department of Public Health, www.idph.state.il.us/envhealth/pcbbugs.htm
Safer Pest Control Project, www.spcpweb.org



SAFER PEST
CONTROL PROJECT

Top Ten Bed Bugs Tips

1 **Make sure you really have bed bugs, not fleas, ticks or some other insect.** You can compare your insect to the pictures on our bed bug Web page or show it to your local extension agent.

2 **Don't panic!** Eliminating bed bugs is difficult, but it's not impossible. Don't throw out all of your things because most of them can be treated and saved. Throwing stuff out is expensive, may spread the bed bugs and could cause more stress.

3 **Think through your treatment options – Don't immediately reach for the spray can.** Try other things first. Integrated pest management (IPM) techniques may reduce the number of bed bugs and limit your contact with pesticides. If pesticides are needed, always follow label directions or hire a professional. There is help available to learn about treatment options.

4 **Reduce the number of hiding places – Clean up the clutter.** A cluttered home provides more places for bed bugs to hide and makes locating and treating for them harder. If bed bugs are in your mattress, using special bed bug covers (encasements) on your mattress and box springs makes it harder for bed bugs to get to you while you sleep. Leave the encasements on for a year. Be sure to buy a product that has been tested for bed bugs and is strong enough to last for the full year without tearing.

5 **Regularly wash and heat-dry your bed sheets, blankets, bedspreads and any clothing that touches the floor.** This reduces the number of bed bugs. Bed bugs and their eggs can hide in laundry containers/hampers, so clean them when you do the laundry.

6 **Don't rely on do-it-yourself freezing as a reliable method for bed bug control.** While freezing can kill bed bugs, temperatures must remain very low for a long time. Home freezers are usually not cold enough to kill bed bugs. Putting things outside in freezing temperatures can kill bed bugs, but it can take several days when the temperature is 0° F and almost a week when the temperature is 20° F.

7 **Use heat to kill bed bugs, but be very careful.** Raising the indoor temperature with the thermostat or space heaters won't do the job. Special equipment and very high temperatures are necessary for successful heat treatment. Black plastic bags in the sun might work to kill bed bugs in luggage or small items, if the contents become hot enough (about 110°F for at least 3 hours).

8 **Don't pass your bed bugs on to others.** Bed bugs are good hitchhikers. If you throw out a mattress or furniture that has bed bugs in it, you should slash or in some way destroy it so that no one else takes it and gets bed bugs.

9 **Reduce the number of bed bugs to reduce bites.** Thorough vacuuming can get rid of some of your bed bugs. Carefully vacuum rugs, floors, upholstered furniture, bed frames, under beds, around bed legs, and all cracks and crevices around the room. Change the bag after each use so the bed bugs can't escape. Place the used bag in a tightly sealed plastic bag and in an outside garbage bin.

10 **Turn to the professionals, if needed.** Hiring an experienced, responsible pest control professional can increase your chance of success in getting rid of bed bugs. If you hire an expert, be sure it's a company with a good reputation and request that it use an IPM approach. Contact your state pesticide agency for guidance about hiring professional pest control companies.

August 28, 2012
EPA 735-F-12-001



For more information, visit www.epa.gov/pesticides/bedbugs/