#### **Insect Bites and Stings**

#### First Aid Treatment



## **Biting and Stinging Insects**

- VENOMOUS:
  - Wasps
  - Hornets
  - Yellow Jackets
  - All Bees
  - Fire Ants

- NON-VENOMOUS:
  - Chiggers
  - Fleas
  - Lice
  - Scabies
  - Bed Bugs
  - Ticks
  - Mosquitoes

# Symptoms of Bites and Stings

<u>SYMPTOMS</u>	VENOMOUS	NON-VENOMOUS
Itching	Sometimes	Always
Pain	Always	Uncommon
Allergic Reactions	Common	Rare
Swelling or redness	Intense	Mild or absent

# The Differences Between Bites and Stings

- The differences are due to the nature of the bite or sting.
  Venomous insects attack as a defense mechanism, injecting painful, toxic venom through their stingers to punish you so you'll stay away next time.
- Non-venomous insects bite and usually inject anti-coagulant saliva in order to feed on your blood.
- Although local irritation and "allergic" reactions do occur from non-venomous bites, severe reactions such as anaphylactic shock only happen from venom stings.

- When honey bees sting, they leave the stinger and venom sack attached.
- Venom continues to pump in through the stinger until the sack is empty or the stinger is removed.
- The only good part about this is that honey bees die after they sting.
- Wasps, hornets, and yellow jackets don't leave their stingers, thus can sting you over and over.

## Local vs. Systemic Reactions

- Venomous stings are always very painful, red, and swollen up to 12 inches around the sting site.
- This is called a local reaction. In sensitive individuals, a systemic or "whole body" reaction occurs, with redness, hives (itchy raised skin lumps), and swelling far away from the sting site.
- These systemic reactions can progress to involve the airways and circulation and may be lifethreatening. Obviously it's important to know the difference between local and systemic reactions.

- Biting insects generally aren't dangerous because allergic reactions are extremely rare.
- True, they do spread diseases like Lyme, Rocky Mountain Spotted Fever, encephalitis, and malaria, but for most of us their bites just cause terrible itching.

# **Avoiding Stinging Insects**

- Don't wear perfume or scented lotions.
- Control odors at picnics, garbage areas, etc.
- Avoid brightly colored clothing outdoors.
- Destroy or re-locate all known hives or nests near your home.

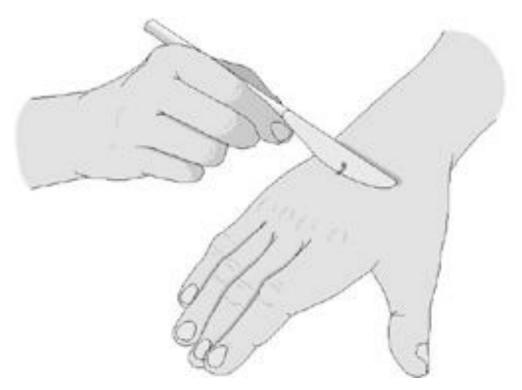
# Avoiding Mosquitoes, Chiggers, and Ticks

- Cover as much of your skin as possible with clothing, hats, socks, etc.
- Pay special attention to cuff areas at ankles, wrists, and neck.
- Avoid swamps (mosquitoes), dense woods, fields, and brush (ticks, chiggers).
- Examine exposed skin and scalp areas for clinging ticks after returning from hikes.
- Use insect repellent.

#### **Treatment of Stings**

- First, the stinger must be removed (see diagram on next slide).
- Pain, swelling, and itching are the main complaints.
- Home remedies include baking soda or meat tenderizer compresses to "draw out" or destroy protein-based venom. Scientific data is lacking with these techniques, but they do make logical sense.

## Remove stinger with a knife edge or Credit Card by Scraping. Do not pull with fingers or tweezers



#### Treatments

- After removing stingers if they are present, wash area thoroughly with soap and water
- Apply hydrocortizone-type creams if they are available
- Motrin or other anti-inflammatory medicines are also helpful
- If the reaction is SYSTEMIC, get them to a doctor right away