

# Fever

## Definition

- Fever is a temperature above 100.4°F (38°C). A rectal temperature is most accurate for infants.
- Knowing the exact number (as thermometers vary widely) isn't crucial in most cases.
- Fevers are a normal, healthy response to illness and help fight infections. They are not harmful on their own.

## Benefits

- Part of a Healthy Immune Response: Fever is the body's natural way to fight infections, and it helps your immune system work better by slowing down germs and boosting immune cell activity.
- Controlled Body Response: Fever is the body turning up its thermostat in a controlled way. It's not harmful by itself and won't cause brain damage. An extremely high temperature (over 107°F) can cause harm, but this is very rare and usually due to external factors like being in a hot car.

## Helpful tips

- Even if a **child “runs cooler,”** this does not mean that 99-100.3°F is a “fever for them.”
- The height of fever does not correlate with the degree of illness
- Fever that does not resolve with fever-reducers is not a red flag. When fever reducers are given, we often see a reduction in temperature by 2-3 degrees, but **do not worry if the temperature doesn't go down to baseline. We treat fevers to keep the child comfortable, not because the degree of fever is harming the child or worrying us.**
- Fever-reducers don't stop febrile seizures. Seizures usually happen early in an illness because of the body's inflammatory response, which starts before the fever rises. They can occur at any temperature.
- There is **no perfect or best thermometer.** Also, **knowing the exact number doesn't necessarily matter,** except in specific cases where a child needs urgent care for fever. These cases would include an infant under 3 months or a child who is immunocompromised, such as with cancer or sickle cell disease.
- **Alternating acetaminophen & ibuprofen every 3 hours is not always recommended.** While not inherently harmful, this practice can lead to dosing errors and increased risk of adverse effects. However, if still very uncomfortable, and not yet time for the next dose of medication, you can give the alternate medication.

Goals for fever management are to provide comfort and hydration

## Risks

- Fevers can increase dehydration risk, especially if they last a long time. It's important to make sure your child drinks enough fluids. Offer clear fluids or popsicles very often.

## When to be more concerned

Though this does not mean there is a serious problem, we want to discuss these symptoms with you.

- Fever present 5 days or more. Fever with most viral infections resolves within 72 hours; however, fever can be present for up to 5-7 days with the flu and other viral illnesses
- Signs of dehydration (no urine output in 8 hours, dry mouth/lips)
- Additional symptoms: neck stiffness, seizure, breathing difficulty, rash, or unusual bruising,
- Not “perking up a little” with fever reducers and temperature decreasing
- Overall getting worse each day
- Change in mental status such as being so tired they won't get off the couch or are difficult to awaken (lethargy), being inconsolable, or being confused

# Fever

## Fever reducing medications

- The goal of therapy is to bring the fever down so the child feels comfortable.
- From 6 months and up, you can choose either ibuprofen/Motrin/Advil OR acetaminophen/Tylenol. **Both are considered to be safe and effective.** Every child responds a little differently. If medication administration is difficult, ibuprofen may be a better choice due to it lasting longer.
- Do not give any fever reducer under 2 months old. Do not give ibuprofen (Advil/Motrin) to any infant under 6 months (acetaminophen is okay from 3-6 months). Do not give aspirin to any child under 16 yrs.

## Other ways to reduce fever

- **The goal of therapy is to bring the fever down so the child feels comfortable**
- Dress in 1 layer of clothing, unless they are shivering, to prevent trapped heat close to the body
- Increase fluids until urinating every 2-3 hrs to help cool the body & prevent dehydration
- Offer Lukewarm baths or cool compresses **ONLY IF IT HELPS COMFORT THE CHILD.** Often these can be irritating to the child or cause shivering, and in such cases, there is no need to try these things.

## Acetaminophen and Ibuprofen Dosages

ACETAMINOPHEN DOSING GUIDE TYLENOL AND OTHER BRANDS			
<ul style="list-style-type: none"> <li>• If possible, use weight to dose, otherwise use age</li> <li>• Give every <b>4-6 hours</b>, as needed. No more than 5 times in 24 hours (unless directed by your provider)</li> <li>• Use only the dosing device that comes with the product.</li> </ul>		Infants' New Formulation or Children's Liquid	Children's Chewable Tablets
		Active Ingredient: Acetaminophen 160 mg in each 5 mL or 1 tsp.	Active Ingredient: Acetaminophen 160 mg in each tablet
Weight	Age	Dose	
6-11 lbs (2.7-5 kg)	0-3 months	1.25 mL (¼ tsp)	
12-17 lbs (5.5-7.7 kg)	4-11 months	2.5 mL (½ tsp)	
18-23 lbs (8.2-10.5kg)	12-23 months	3.75 mL (¾ tsp)	
24-35 lbs (10.9-15.9 kg)	2-3 years	5 mL (1 tsp)	
36-47 lbs (16.4-21.4 kg)	4-5 years	7.5 mL (1 ½ tsp)	
48-59 lbs (21.8-26.8 kg)	6-8 years	10 mL (2 tsp)	
60-71 lbs (27.3-32.3 kg)	9-10 years	12.5 mL (2 ½ tsp)	
72-95 lbs (32.7-43.2 kg)	11 yrs	15 mL (3 tsp)	

IBUPROFEN DOSING GUIDE ADVIL, MOTRIN, OR ANOTHER BRAND				
<ul style="list-style-type: none"> <li>• If possible, use weight to dose, otherwise use age.</li> <li>• Give every <b>6-8 hours</b>, as needed. No more than 5 times in 24 hours (unless directed by your provider).</li> <li>• Use only the dosing device that comes with the product.</li> </ul>		Infant's Drops (Concentrated)	Children's Liquid	Children's Chewables or Junior Tablets
		Active Ingredient: 50 mg in each 1.25 mL	Active Ingredient: 100 mg in each 5 mL or 1 tsp	Active Ingredient: 100 mg in each tablet
Weight	Age	Dose		
<b>Not for children younger than 6 months</b>				
12-17 lbs (5.5-7.7 kg)	6-11 months	1.25 mL	2.5 mL (½ tsp)	
18-23 lbs (8.2-10.5kg)	12-23 months	1.875 mL	3.75 mL (¾ tsp)	
24-35 lbs (10.9-15.9 kg)	2-3 years		5 mL (1 tsp)	1 tablet
36-47 lbs (16.4-21.4 kg)	4-5 years		7.5 mL (1 ½ tsp)	1 ½ tablets
48-59 lbs (21.8-26.8 kg)	6-8 years		10 mL (2 tsp)	2 tablets
60-71 lbs (27.3-32.3 kg)	9-10 years		12.5 mL (2 ½ tsp)	2 ½ tablets
72-95 lbs (32.7-43.2 kg)	11 yrs		15 mL (3 tsp)	3 tablets