

# Understanding Fast Heart Rates in Children:

## Sinus Tachycardia versus Supraventricular Tachycardia (SVT)

### What Is Tachycardia?

Tachycardia means the heart is beating faster than it should for a patient's age or activity level.

### Two Common Types of Tachycardia

#### 1. Sinus Tachycardia

This is a normal fast heart rate caused by the body's response to things like:

- Exercise or activity.
- Fever or illness.
- Emotions like anxiety or excitement.
- Caffeine or energy drinks.



Sinus tachycardia starts and stops gradually. The heart rate varies during the episode and is usually below 180 bpm.

#### 2. Supraventricular Tachycardia (SVT)

SVT is an abnormal rhythm caused by extra electrical signals in the heart. It differs from sinus tachycardia in that it:

- Starts and stops suddenly.
- Has a steady, fast rate (often over 180–220 bpm).
- Can happen even when resting.

#### You may feel:

- Like your heart is pounding.
- Dizzy or weak.
- Chest discomfort.
- Lightheaded or nauseous.

### How to tell the difference

**Sinus Tachycardia:** Gradual, varies, <180 bpm, can slow down with rest.

**SVT:** Sudden, steady, >180–220 bpm, feels like a light switch goes on and then goes off.

## When to go to the Emergency Department

Go to the nearest ED if your child:

- Has a fast heart rate over 180 bpm for more than 30–60 minutes.
- Feels faint, and the fast rate doesn't stop.
- Struggles to breathe during the episode.

## How is SVT treated?

- Teaching your child to stop episodes with special techniques called Valsalva maneuvers.
- Medications.
- Ablation procedures.

## Good News!

Most kids with sinus tachycardia or SVT live healthy lives. Knowing the signs helps keep them safe.

