

# Emergency and Urgent Care for Children - A Survival Guide

Midlands Critical Care & Trauma Networks 



West Midlands Ambulance Service   
NHS Foundation Trust



UNIVERSITY OF  
BIRMINGHAM

## WEEK 1

### Fever - Parent Information Leaflet

This session concentrates on children with a high temperature (fever) which is one of the commonest things to prompt parents to seek medical attention for their child. We will discuss the sort of things that cause temperatures, what to be worried about, what medications you can give, and give a guide about when to seek medical advice. But please remember this is only a guide; the baseline is, if you are concerned you should get the child with fever checked out.

Temperatures can be caused by either viral or bacterial infections; viral causes predominate. Viruses can cause colds, coughs, tonsillitis, ear ache, diarrhoea, vomiting and rashes. Viral illnesses do not respond to antibiotics and supportive management with fluids and medications to ease symptoms (pain relief for sore throats for example) is the most important thing you can do at home. We are going to go through some of these conditions in later sessions, so here we are going to concentrate on managing the child with fever. Less commonly, temperatures can be a sign of a bacterial infection, and these have the potential to be more serious (pneumonia, meningitis, toxic shock).

So lets talk a bit about the fever itself. Firstly, a temperature does not need to be recorded with a thermometer (unless the child has another medical condition in which it is important to be able to measure the temperature such as children on chemotherapy who need to be assessed in hospital if they have a documented fever) In most cases, you as a carer are in the best position to know when your child is hot.

There is a lot of variability in thermometers and some of the most expensive digital thermometers can be inaccurate. Paediatricians have known for a long time that if a parent tells them their child was hot, then that child had a fever For definition purposes a temperature is classified as greater than 38 degrees but the number itself does not help in deciding what is wrong with a child; another reason to ditch the thermometer as the higher the temperature it shows, the more worried the parents get. I have lost count of the times I've been met with a frantic parent telling me that the temperature was 40 degrees, only for them to be surprised by my nonchalant reply.

The height of a fever is not a good predictor of the cause, what is more important is how the child himself looks. I would be more concerned by a child with a temperature of 38 who is listless and pale than one with a temperature of 40 who runs past you in the waiting room.

So what should you be doing with a child with a temperature? I think it is important here to say that a child having a temperature is ok; it is merely a sign that your child is fighting an infection of some sort. The high temperature is a defence mechanism designed by clever mother-nature, which makes it more difficult for viruses and bacteria to survive. The thermostat controlling the child's temperature is adjusted to a level that helps fight infection. Hence bringing down temperatures may sometimes be the wrong thing to do, as well as being difficult to do; as soon as the medications wear off, the temperature will spring back up again.

So antipyretics (paracetamol and ibuprofen) aren't always necessary. If your child isn't distressed by the fever or underlying illness, there's no need to use antipyretics to reduce a fever. Typically a toddler can be hot, but remains happy and playful. In this case why treat the fever? If however, your child is distressed, lethargic, or doesn't look right, then bringing down their temperature is a good idea, particularly as you can then assess how they look when the temperature is down. A child who perks up when the temperature is lowered, becomes interested in playing is less likely to have a serious cause for the fever than one who remains listless.

Paracetamol and ibuprofen are both effective ways to temporarily reduce a temperature. Stripping children down to their nappy or pants will allow them to reduce the temperature themselves, where as wrapping children up will make temperature go up even if they are shivering. It is important to give cool fluids which will both reduce their temperature and prevent dehydration.

Of note, both paracetamol and ibuprofen can be given together, but this is rarely necessary. It is important to follow the dose instructions on the bottles. Some parents find that one of these medications works better to bring the temperature down than the other, but there is no rule to this and is totally dependent on your child. Be aware that ibuprofen should be given cautiously in children who are not drinking; we know when children are a little dehydrated, ibuprofen can put a strain on the kidneys.

So when should you be worried about your child with a fever?

Children with a high temperature may look quite unwell. When hot they tend to be sleepy, flushed, breathe a bit more quickly, be miserable and go off food and drink, however as discussed earlier its common for them to "perk up" and be running around 1 hour later after a dose of paracetamol! This is a reassuring sign.

Serious infection signs are discussed later in this session with a colour chart but if your child doesn't look better with a normal temperature, is still breathing

fast, becomes more sleepy and unresponsive, or has a seizure because of the temperature it is important to get advice from a GP or Emergency Department.

Medical advice should also be found urgently, if a baby less than 3 months has a temperature (either feels hot, or is recorded at more than 38 degrees centigrade). This group are more at risk of serious infections because they are so young, and it can be difficult to tell whether they are seriously unwell as their presentation can be very subtle with poor feeding, “not quite right”, fewer wet nappies, not sleeping as well, for example.

As with all these parental advice sessions, we are trying to give you the confidence to be able to treat your child, but we always recognise that if a parent is worried they should bring their child to be reviewed by a medical professional.