

# Constipation in Children and Young People

# What is Constipation?

Constipation is common in childhood and is defined as the inability to do a poo regularly or to completely empty the bowel. If your child does not open their bowels often enough, their poo's can become hard and dry. Some children with constipation may open their bowels every day but may not empty their bowels properly and therefore may only pass small poo's which may be hard, sticky, dry or gritty. Left untreated or treated too gently can lead to soiling.



# Because you 🕅 atter

# **Causes of constipation:**

The exact cause of constipation is not fully understood however there are known factors that may contribute as follows:

- Dietary and fluid intake
- Dehydration
- Pain
- Fever and illness
- Psychological issues
- Toilet training
- Toilet avoidance or not sitting on the toilet for long enough
- Medication and familial history of constipation

# Signs and symptoms of constipation:

- Infrequent bowel pattern A normal poo is soft, easy to pass, and its colour will be any shade of brown or dark green. Most children over the age of three open their bowels no more than three times a day and no less than three times per week. Pooing less than three times a week and more than three times a day is a symptom of constipation.
- Irregular texture and size of poo's. Including passing occasional enormous poo's which may block the toilet or frequent small poo's (soft or hard). Poo's may become hard, lumpy, dry, or sticky in consistency
- Excessive and foul-smelling wind and poo's
- Withholding or straining to stop passage of poo's
- Soiling in clothing (any amount of poo in the underwear). This may get better for a few days after doing a large poo
- Abdominal pain, distension, or discomfort e.g., a painful bottom or pain when doing a poo. Appearing to strain to poo or to avoid pooing
- Poor appetite
- Lack of energy, an unhappy, angry, or irritable mood and general malaise

Some children with constipation may also have problems with wetting in the day and/or at night. This is because the normally empty rectum is full of poo that may press on the bladder.

Constipation may also make children more prone to urinary tract infections. However, wetting and urinary tract infections can also happen in children who are not constipated.

If your child is experiencing any of the above symptoms for more than two weeks, they may be constipated and therefore you should seek medical advice.

Sometimes, if children have additional needs, their disability may be assumed to be the cause of difficulties with their bowels. However, all children with a bowel problem, including those who have additional needs, should be offered an assessment and treatment as appropriate.

# How the bowel works:

It is important to understand how the bowel works to understand why things go wrong:

- Food goes in and gets chewed up into small pieces which are then swallowed. The food is further digested in the stomach until it becomes a soup like mixture.
- This mixture then enters the small intestine (small bowel) where the nutrients are taken out and used by the rest of the body.
- The remaining waste liquid (poo) then travels down into the large intestine (large bowel).
- The large intestine has muscles which push the poo along during which time the body absorbs the water. This results in soft, smooth, sausage-shaped poo's.
- The poo is pushed along into the rectum the lowest part of the bowel. This causes the rectum to stretch which sends a message to notify the brain that you need to open your bowels.

# When things go wrong:



- Sometimes children and young people do not act on their body's signal that they need to go to the toilet. Your child might hold on to their poo's if they are distracted or because they have previously passed a painful poo. This causes the poo to build up in the large bowel.
- Children who are constipated tend to pass infrequent formed stools, which may be very large and hard. There may be some smaller poos, soiling or skid marks in their pants due to them holding on and stopping themselves from doing a poo, but they are generally clean in between bowel movements.
- When children become constipated and the poo stays in their rectum the message to the brain that they need to do a poo becomes weaker and weaker until eventually, they lose the feeling that they need to do a poo. If the constipation is not treated effectively the poo in the rectum will continue to gradually build up and a faecal impaction (poo traffic jam) may develop.
- The longer the poo stays in the large bowel, the more water is absorbed by the body. This results in poo becoming harder and bigger in size.
- If the poo remains in the rectum, the rectum remains stretched and is no longer able to send a message to the brain to let the child know that they need to open their bowels. This can result in your child not realising they need to do a poo.
- A child is said to have a faecal impaction when the constipation becomes so severe that they are unable to pass any formed poo. All the poo in their bottom clumps together to form a large

mass, which the child is unable to pass. New poo will keep forming in the large bowel but cannot get past the blockage, so it just builds up.

- Although the child does not feel that they need to do a poo, peristalsis (the muscular movement that moves the poo along the bowel) is still taking place. This pushes the more liquid poo along. Because the rectum is full of poo the anus relaxes slightly, thinking that the child is about to open their bowels, which allows the liquid poo to leak out into the child's underwear. Bits of the old, impacted poo may break off and be passed as well – this often results in the soiling being very smelly. This happens outside the child's control, and they are often unaware that the leakage has happened.
- Children who are impacted are often unable to pass any formed poos at all. They tend to pass loose, mushy or semi-solid poos, sometimes numerous times per day. They may also pass small hard bits of stools. They often do this without any awareness and so will deny it has happened.

It is not always easy to recognise the difference between constipation and faecal impaction, as the symptoms are similar. However, it is important to distinguish between them as they require different approaches to treatment. Because diagnosing these conditions in children is not always straightforward it is important to ask your child's healthcare professional for advice.

# Symptoms that may indicate faecal impaction include any of the symptoms of constipation as well as:

- Inability to pass a formed poo
- Passing only 'rabbit dropping' type poo (small hard bits, that have broken off the larger mass)
- Uncontrolled watery or loose poo, also known as overflow soiling
- Passing lots of wind so child seems to smell of poo even though they are clean
- Significant soiling (poo in the underwear)
- Swollen and painful abdomen
- Lack of appetite

# Soiling:

If your child's bowel is full of poo, they may experience overflow soiling. This is caused by the liquid poo from higher up sneaking around the hard lumps and can leak out of your child's bottom. Overflow soiling can vary in consistency and may be runny, hard, or dry little bits. Your child may not be aware that they have soiled. Continence issues can be debilitating and upsetting. Soiling symptoms may cause social, psychological, and educational difficulties for children and young people. It is important to access advice and support for your child as early as possible as early intervention and treatment can improve the outcome for your child.

# How to help your child:

1. Ensure your child is drinking enough water every day by having a drink with meals or snacks every 2 hours ensuring to take these drinks quickly and that they do not graze.

	Girls	Boys
4-8 years	1200ml (6 x 200ml)	1200ml (6 x 200ml)
9-13 years	1600ml (6 x260ml)	1800ml (6 x 300ml)
14-18 years	1800ml (6x 300ml)	2300ml (6x 380ml)

2. If your child is struggling to take the volumes on the drinks plan it is ok to start small and build up gradually. If they are thirsty at the end of the day, it is likely that they are not getting enough fluids and small increases per drink may be needed to accommodate for changes in their environment or activities.

Please explain to your child that not having enough to drink causes the body to not have enough water on board to keep their bowel motions soft and easy to pass.

Also drinking the wrong drinks can cause dehydration of their bowel and make constipation more likely. It is advisable to take full water bottles to school with markers on the side or to take enough individual bottles and have these returned each day to be re-filled.

 Avoid drinks that are caffeinated; dark or fizzy e.g., tea, coffee, hot chocolate, Cola or energy drinks as well as strong orange and blackcurrant-based juices (including Vimto). Cutting out these drinks for a while can help because these are caffeinated drinks that can cause dehydration and make worse their constipation. Any light-coloured juice is fine and fresh juices are ok but will need to be watered down well. Milk is ok but is a food and not considered a drink; substitute with a non-dairy milk

such as Oat milk as these count as hydrating drinks as they are water based.

- 4. Ensure your child has a well-balanced healthy diet which includes adequate fibre intake. Foods with high fibre content include fruit, vegetables, high-fibre bread, baked beans, and wholegrain breakfast cereal. Ensure where possible low dairy and white refined carbohydrates in your child's diet and ensure 5-9 portions of fruits and vegetables per day. A portion is the flat of the Child's palm. A fibre advice leaflet is attached for your reference. Please note a high fibre diet is not recommended initially with children with constipation if fluid intake is poor as fluids should be improved first to prevent constipation worsening.
- 5. Encourage your child to be active.

6. Develop a good toileting routine. Encourage your child to routinely sit on the toilet ideally 20-30 minutes after each meal for around 5-10 minutes. Children with chronic constipation often have trouble recognising they need to open their bowels. Your child may require lots of encouragement and praise. Please explain to your child that they will also need to sit on the toilet with a step stool to ensure their knees are higher than their hips. It may also be helpful to consider a toilet seat to ensure your child is sitting comfortably and provide them with activities such as blowing bubbles to help relax their body and allow the poo to come out more easily. Poo needs to be passed once to three times a day



7. Keep a record of your child's bowel motions on the chart included with this leaflet for two weeks and if symptoms are not improving, make an appointment as soon as possible to see the GP to review this and complete a physical examination of your child. The GP will assess your child and identify if they are constipated. If any underlying causes are identified, your child will be referred to a Paediatrician. If your child is constipated but no underlying causes are identified (known as idiopathic constipation) Laxative treatment is recommended.

There are different types of laxatives for children and young people. Macrogol laxatives such as Movicol Paediatric Plain, Laxido or Cosmocol are the NICE recommended first-line laxatives for treatment of constipation. These work by getting more water into the bowel to soften the poo and make them easier to pass. It is important to ensure the powder within the sachets is mixed with the required amount of water, so they work effectively.

# **Oral Laxative Treatment**

If your child has been constipated for more than two- four weeks, they will likely need a Dis impaction to ensure the poo that has become stuck has to be cleared out of the bowel otherwise the soiling will continue, and the constipation will not get better. To achieve this your child may need to take increasing doses of laxatives. This is often called a Dis impaction regime. Macrogol 3350 laxatives are usually used for this and can be Laxido, Cosmocol or Movicol preparations.

If your child has been experiencing constipation for a few weeks and you just give a standard dose of laxative it is likely to soften the poo but not allow the bowel to empty the constipation fully. This means that symptoms such as soiling may get worse rather than better!

It usually takes 2 - 3 days for the macrogols to start to work. By day three you may start to notice a change in your child's bowel movements. The number of days your child will need to stay on the increasing or higher doses will depend on how long it takes for them to completely empty out their bowel.

You will know that their bowel has emptied because their poo will be watery (Type 7 on the bowel diary, included at the end of this leaflet). The watery poo may have little 'bits' in it from undigested foods and may be any shade of brown, but if Dis impaction isn't complete it will still have big lumps in it. This process usually takes between five and seven days, although it could take longer. Do not continue with Dis impaction for more than two weeks unless advised to do so by your healthcare professional. Once you notice your child's bowel has completed the Dis impaction you can stop giving the increased doses and reduce to a **maintenance dose**.

Your child will need to continue taking maintenance laxatives for several months after dis impaction to prevent recurrence of constipation, and to allow the stretched bowel to regain its tone and function. This medicine should not be stopped abruptly.

	Day 1	Day 2	Day 3	Day 4	Day 5	Day 6	Day 7
	sachets						
Child under 1	1⁄2-1	1⁄2-1	1⁄2-1	1⁄2-1	1⁄2-1	1⁄2-1	1⁄2-1
Child 1-5 years	2	4	4	6	6	8	8
Child 5-12 years	4	6	8	10	12	12	12

### **Dis-impaction should be as follows:**

Children over 12 years should be treated with the adult preparation – the medication is the same but there is twice as much in the sachet:

	Day 1	Day 2	Day 3	Day 4	Day 5	Day 6	Day 7
Child over 12	4	6	8	8	8	8	8

# A copy of how to prepare Macrogol medication is included in this leaflet along with a go faster jelly recipe to help if your child is struggling with the taste of the medication.

## Maintenance Doses:

NICE recommends macrogol laxatives maintenance dose as follows:

- Child aged less than a year <sup>1</sup>/<sub>2</sub>-1 sachet/day
- Child aged 1-5 years
   ½-3 sachets/day
- Child aged 5-12 years
   1-4 sachets/day
- Child aged over 12 years 1-2 adult sachets/day OR 2-4 paediatric sachets/day

When down to the maintenance dose it should be adjusted to ensure your child passes at least one soft stool every day. You will therefore need to monitor your child's poo's and increase/decrease their softening laxative doses accordingly. Be guided by stool type and pattern and decrease the dose if it is too soft/sloppy. Long term use of laxatives will not hurt your child, but poorly treated constipation will.

If after a period of one week you notice that your childs stool type is better but still not regular, please book an appointment with your GP who will consider adding in a stimulant laxative alongside their maintenance laxative e.g., Sodium Picosulphate, Senna or Docusate Sodium. These encourage the bowel to push the poo out.

Your child's GP, Paediatrician or School Nurse may also refer your child to the Children's Bladder and Bowel Specialist Service. This team is made up of two Specialist Paediatric Nurses and an Assistant Practitioner who can support your child with their bladder or bowel needs.

# **Notes on Laxatives:**

- If you try to reduce the laxatives too quickly your child may struggle to poo the constipation may come back. Always follow the advice of your healthcare professional when reducing the laxatives.
- If your child's poo becomes loose (type 5 7) on the Bristol stool chart and they have been going for a medium to large poo most days, that would indicate that they need less laxative. You could start to reduce the dose slightly.
- Not all children will develop loose poos as their bowel recovers. If your child has been having soft, medium to large size poos once to three times most days for at least 3-6 months their healthcare professional may suggest that you try to reduce the laxatives slowly. If your child is on more than one laxative, it is usually suggested that you only alter the dose of one at a time.
- It is often suggested that after your child has been on a regular maintenance dose with no
  problems for about six months you could start to reduce Macrogols by half to one sachet at
  a time. E.g., if your child is having two sachets every day you reduce to one and a half sachets
  or one sachet a day. Stay at the reduced dose for about four to six weeks

- before trying to reduce again. If they open their bowels less often or have any symptoms of constipation, then they may need some extra (see the next section for more information).
- Stimulant laxatives should also be reduced slowly. These should be reduced by about 2.5mls at a time. E.g., if your child is having 10mls of stimulant laxative (sodium picosulfate or senna) then reduce to 7.5mls a day and stay at that dose for 4-6 weeks, before trying to reduce again
- If your child does smaller poos than usual, if the poos are hard (type 1 or 2), if your child appears to be withholding, if they have not done a poo at all for 24 hours or more, or if there are any other symptoms of constipation, then you should give them extra laxatives, so long as your healthcare professional is happy for you to do this.
- If you are reducing the maintenance dose and you need to give extra laxative more than once a week, then it is usually suggested that you increase the daily dose to the level at which your child was last doing soft poos most days with no pain, discomfort, withholding or other symptoms of constipation. Ask your childs healthcare professional for advice.
- There is more information on how to adjust the dose of laxatives on the Poo Nurses video at <u>www.thepoonurses.uk</u>

# Further information & Resources can be found at:

### **Mid Cheshire NHS Foundation Trust**

Mid Cheshire NHS Foundation Trust Bladder and Bowel services :Mid Cheshire Hospitals NHS Foundation Trust (mcht.nhs.uk)



ERIC continence Charity - <u>www.eric.org.uk</u>

Bladder and Bowel UK Charity - <u>Bladder & Bowel UK -</u> <u>bladder and bowel problems information and advice</u> (<u>bbuk.org.uk</u>) <u>Bladder and Bowel services</u>



# **Bowel Diary**

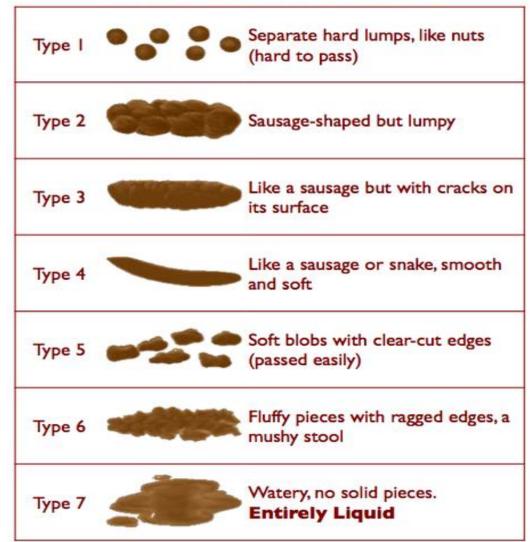
Name:			N	NHS Number:			
DoB		Dat					
Week 1	Time	Туре	Size:s,m,I	Location	Comments		
Monday							
<b>T</b>							
Tuesday							
Weds							
Thurs							
Friday							
Friday							
Saturday							
<i></i> ,							
Sunday							

Name:	NHS Number:				
DoB:		Date			
Week 2	Time	Туре	Size:s,m,I	Location	Comments
Monday					
-					
Tuesday					
Weds					
Thurs					
Friday					
Saturday					
Sunday					

# EXAMPLE OF HOW TO COMPLETE THE CHART

	Time	Туре	Size S M L	Location	Comments
Monday	08.30	4	S	toilet	Said tummy hurt
					1 movicol given
	16.10	6	S	pants	Then sat on toilet
	16.20	5	S	toilet	
	19:30	5	М	nappy	

# **Bristol Stool Chart**



# When completing this diary, it is important to note any of the following:

- Colour of stool passed (Light brown, medium, dark brown, black)
- Odour
- Ease of wiping
- Discomfort/length of time to pass stool
- Soiling

# HOW TO USE MACROGOL LAXATIVES

(Movicol, CosmoCol and Laxido are all names of macrogols)



Macrogol laxatives work by 'binding with' water and delivering it to the large bowel. It is essential therefore to mix it with the correct amount of water or it will not work!

# Paediatric sachets should be mixed with at least 63mls water PER SACHET

Adult sachets should be mixed with at least 125mls water PER SACHET

Empty the sachet of powder into a cup/glass/bottle. First add the right amount of cold water and stir until the powder has dissolved and the water is clear. The resultant liquid can be mixed with anything your child likes, to encourage them to drink it e.g. squash, juice, hot chocolate, milk. **DO NOT** mix the powder straight into the milk/juice/flavoured drink – it needs to 'bind' with the water first.

# Tips

- Formula fed babies- Mix the macrogol with 63mls previously boiled water per sachet. Prepare formula according to the manufacturer's instructions using water which is at least 70°c. Add sufficient formula to macrogol water to flavour it and mix well. DO NOT add macrogol water to the baby's whole feed in case they don't finish it.
- If your child does not like the taste, try mixing the macrogol earlier and chill it in the fridge it will last 6 hours after mixing (Laxido) or 24 hours (CosmoCol and Movicol).
- Try a flavoured macrogol e.g. Movicol Chocolate, Orange/lemon/lime CosmoCol.
- Try making macrogol jelly or ice lollies, mixing the macrogol water with fruit juice.
- Buy a new cup just for macrogols, and/or a fun straw to drink through.
- Experiment with adding the macrogol water to milk and pouring it on the child's breakfast cereal.
- The macrogol water can be added to **anything**, so try a variety of drinks and foods to work out what suits your chil

#### **IMPORTANT!**

As the macrogol water is not absorbed, it can't be included in the child's daily fluid requirement. So, if your child is drinking six cups a day, but that includes their macrogol, you'll need to give them extra drinks or they will not be properly hydrated.

All children need a minimum of 6 - 8 cups of drink a day to stay healthy. For children with bladder or bowel problems, 8 drinks a day is ideal.

#### **Example:**

A 7 year old child on 4 sachets of macrogol a day will need:

Regular drinks: 1600mls	8 x 200mls =
PLUS:	4 x 63mls =

TOTAL = at least 1850mls

© ERIC 2022

# Information on improving fibre and fluid intake in your child's diet

### What is fiber and why is it important?

Fiber is the non-digested part of food. It is found in plant foods such as cereals, vegetables, and fruit. Fiber content in food is included on the packaging.

Fiber absorbs water as it passes through the gut. It swells up like a sponge to make the stool soft and easier to pass. The extra bulk also helps the gut muscles to work better and helps pass the poo along.

#### Why is fluid also important?

Increasing fiber in the diet will only work if children drink enough. You should offer your child six to eight cups of fluid every day, such as water, well diluted unsweetened fruit juice or fruit teas and milk drinks.

#### What foods to choose?

#### Breads, cereals and potatoes

Wholemeal and granary breads have most fiber. High fiber white breads are good alternatives to white bread. Brown bread can have a similar amount of fiber to high fiber white bread. There is nutritional information on the packaging, which will tell you how much fiber is in each particular varieties of bread.

#### Pasta and rice

Brown rice and wholemeal pasta have more fiber than white.

#### Potatoes

Offer jacket potatoes, homemade chips and wedges or boiled potatoes with the skins on.

#### **Breakfast cereals**

Choose high fibre varieties, such as wheat biscuits, bran flakes, porridge, instant oat cereal and other wholegrain cereals.

#### **Biscuits and cakes**

Digestives, oatcakes, flapjacks and fig rolls are better biscuit choices. Offer scones, fruited teacakes, malt breads and cakes made with more wholemeal flour or add oats to crumble topping.

#### Nuts

All nuts are high in fibre and so is peanut butter. Use this on bread or high fiber crackers. (Do not give nuts to children under five years and avoid salty nuts).

#### **Vegetables and fruit**

Include a variety of fruit and vegetables in your child's diet; these can be fresh, frozen, dried or tinned. We should all eat five to seven portions of fruit /vegetables a day (a portion is a childs handful not an adult one).

#### Pulses

Baked beans chickpeas and lentils.

Activity and exercise -Try to encourage your child to be physically active for 60 minutes a day. Increase this gradually and seek advice from your school health team if you want further help on how to do this.

# **Go Faster Jelly** By Elin Foden and Patrick Davies

#### A helpful recipe for those with constipation and an aversion to treatment tastes!

Although Polyethylene glycol (Movicol) is generally well tolerated in the treatment of constipation in children, some find it difficult to take either due to palatability or volume.

The family of a patient with Rett Syndrome had found Lactulose to be ineffective in treating her constipation, and had difficulties in encouraging their daughter to take alternatives. They have developed a novel solution to this problem, which they have called "Go Faster Jelly".

Using trial and error they found out how many sachets of polyethylene glycol could be dissolved in a pint of jelly without preventing it from setting, and found 4 to be optimal. Using more than 6 sachets per 500 ml prevents the mixture from setting.

The recipe is as follows:

- Mix 4 x 6.9g sachets in 250 ml of cold water; stir well to dissolve.
- Place 1 x 135g packet of jelly cubes in a jug and add boiling water up to 250 ml; stir well to dissolve.
- Allow to cool slightly before stirring in the dissolved Movicol.
- Refrigerate until set.

The resulting "Go Faster Jelly" can then be given to effect, producing a soft but formed stool. It is used in combination with other methods (plenty of fluid, dried fruit and regular toileting) when more than a couple of days have passed without a bowel movement.

The manufacturers do not recommend storing prepared Movicol for longer than 6 hours but the family have found no apparent problems when keeping the (clearly labelled!) jelly covered in the fridge for up to 4 days. This is a practical way of giving this useful laxative to children with chronic constipation.

This information is available in audio, Braille, large print, easy read and other languages. To request a copy, please ask a member of staff.

Printed: April 2023 Review: April 2026 Ref: CCICP/PBBS/0050423



# Because you 🕅 atter