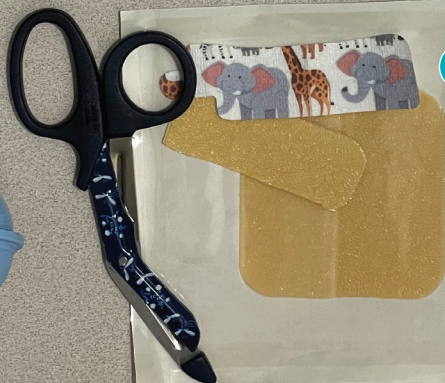
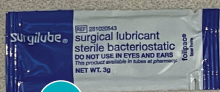




Mass General Brigham
Mass Eye and Ear

Passport Home

A family guide to caring for your child's nasogastric tube (NGT) at home



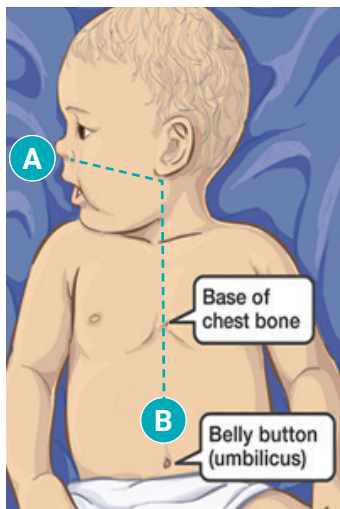
Equipment needed

- 1 Properly sized NGT (identified as size 5F, 6.5F, or 8F). Your provider will let you know the right NGT size for your child.
- 2 Water soluble lubricant or plain water.
- 3 No sting barrier film to help protect skin.
- 4 DuoDerm and pre-measured tape cut into strips for NGT securement.
- 5 Syringe to aspirate stomach contents once NGT is inserted and secured.
- 6 Small medicine cup and pH paper to test stomach content for pH (less than 5) to ensure correct placement.
- 7 Blanket for swaddling and pacifier or small amount of Pedialyte to facilitate swallowing during placement.
- 8 Marker
- 9 Nasal bulb



Scan the QR code to watch a step-by-step tutorial on how to care for your child's nasogastric tube (NGT) at home.

How to measure for depth



Measurements on an infant

- Hold the tip of the tube at the end of the nose and measure to the earlobe (A)
- Hold the tube at the earlobe, measure to the mid umbilicus (halfway between the breast bone and belly button) (B)

An alternative way to estimate depth can be done by using the formula below:

- Estimated NGT depth = $3 \times \text{weight in kg} + 13 \text{ cm}$
- Example: Infant weighs 4 kg
 $25 \text{ cm deep} = 3 \times 4 \text{ kg} + 13 \text{ cm}$

If the NGT does not have pre-measured marking, use a permanent marker to mark the tube.

How to place the NGT

1. Swaddle your infant with their arms down by their side, or have another caregiver assist with holding your baby still for the insertion of the NGT.
2. If possible, have your baby sit in a car seat or baby bouncer.
3. Check each nostril and clean if needed.
4. Wash your hands.
5. Inspect the tube to make sure it's not damaged.
6. For easier placement, offer your infant a pacifier to suck on or sips of Pedialyte while the NGT is placed to encourage tube advancement.
7. Dip the end of the tube in water or water-soluble lubricant.
8. Insert the tip of the tube into the nostril, guiding it toward the back of your baby's throat until the pre-measured mark sits right at the opening of the nostril, clearly visible.



> Do not force the tube. If you hit resistance or cannot advance it to the pre-measured mark, remove the NGT and try again with a new NGT.

Securing the NGT

Once the tube is inserted to the correct depth, momentarily secure the NGT:



Start by placing your finger on the marked depth at the nostril and apply the no sting barrier film across the cheek (*image 1*).



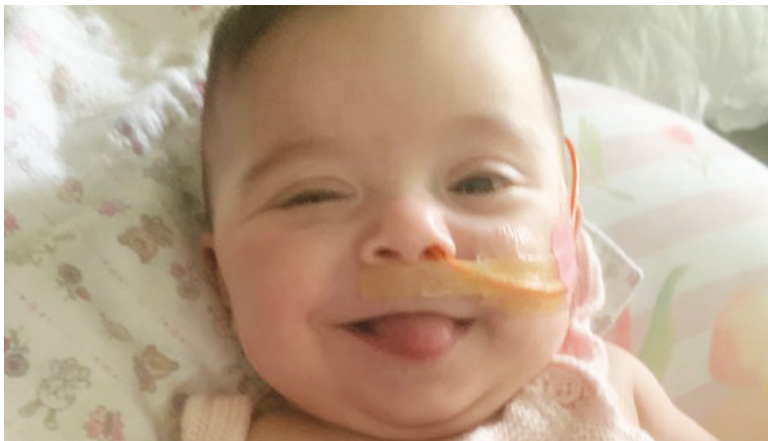
Apply a pre-cut piece of DuoDerm (*image 2*) across the cheek and drape the NGT over the DuoDerm (*image 3*).



Apply a second pre-cut piece of DuoDerm directly on top of the NGT and first DuoDerm piece (*image 4*).



Apply a small strip of Tegaderm tape over the DuoDerm for extra securement, ensuring that the marked depth is clearly visible (*image 5*).



> If you have trouble putting the NGT in and your child is due for a feeding, call your doctor's office for guidance.

Remove the NGT if:

- Your baby starts to cough or cannot catch their breath.
- Your baby's skin starts to change color (pale or bluish).
- The NGT is coming out of your baby's mouth.

How to check placement

1. Confirm that the correct depth marking is visible.
2. Have your pH color reference guide and pH test paper ready.
3. Attach a syringe to the end of the NGT and pull back on the plunger to remove a small amount of fluid from your baby's stomach.
4. Empty the fluid into a small medicine cup and place the pH test paper into the cup.
5. Remove the pH test paper and match the color changes right away to the color guide.
 - Normal pH is less than 5.
 - A pH greater than 5 may mean the NGT is not in the right place.



> When in doubt, change it out!

Additional instructions

If you are unable to obtain stomach fluid, try any of the following methods listed below until placement is confirmed:

- Use a larger sized syringe (30–60 ml).
- Change your child's position to their right side or on their back.
- If you are still having trouble after trying the above steps, remove any fluid that may be in the tube, remove the NGT, and replace the NGT with a new one.

When to check your child's NGT placement:

- Before each tube feeding or medication administration.
- When a new NGT is placed.
- When you are concerned that the NGT may have moved.
- If your child is choking, coughing, or having difficulty breathing.

When to change your child's NGT:

- Every two weeks or as directed by your doctor (remember to switch nares).
- The NGT will need to be re-measured/calculated each time it is replaced since your child is growing and the NGT may need to be placed a little deeper.
- If your child's nostril or skin is irritated (red, rash, skin tears, blisters).

Changing/removing the NGT

1. Wash your hands.
2. Swaddle your child and position them on their back with their head elevated or in a sitting position.
3. Ensure that the NGT cap is closed.
4. Gently remove tape from NGT and cheek.
5. Once the tape is removed, smoothly, steadily, and gently remove the NGT from your child's nostril.

> Before inserting a new NGT, be sure to re-measure for depth.

> Always remove old NGT before inserting a new one.

References

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