

Antroduodenal Manometry

Gastrointestinal motility (moe-TILL-it-ee) means the normal contractions of the digestive tract. These contractions allow the food we eat to move through the whole digestive tract (Picture 1). (The tract measures about 30 feet from the mouth to the rectum.) Food moves through the tract when the nerves and muscles in the tract work together to push it along.

Purpose of this Test

The antrum is at the outlet of the stomach next to the intestine. The duodenum is the first part of the small intestine closest to the stomach.

An Antroduodenal Manometry (an tro doo oh DEE nul mah NOM eh tree) records the pressure waves that are produced in the stomach and small intestine. The strength and coordination of muscle contractions are measured before and after eating. When we measure antroduodenal motility, it tells us how well the stomach and intestine are working.

Be sure to tell your child's doctor if the child has had problems with sedation in the past. Also tell the doctor if your child has apnea, other breathing problems or a heart condition. This will help the doctor decide what sedation is best for your child.

APPOINTMENT

Child's Name: _____

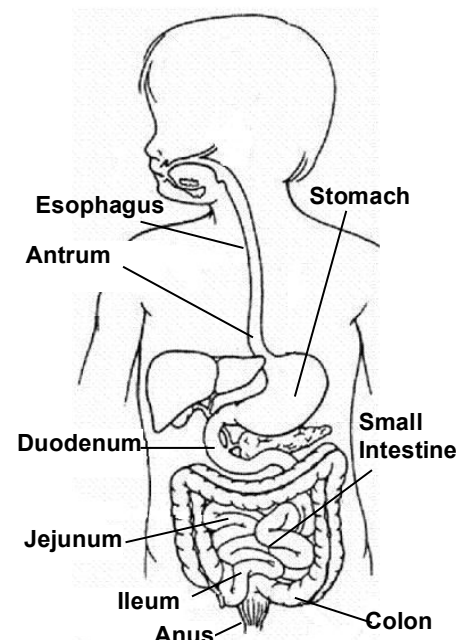
Arrival Date: _____

Arrival Time: _____

☐ Check in at the Admitting Department in the Main Lobby of the hospital.

☐ Check in at the Crossroads Registration.

☐ Check in at the GI Department, 1st floor, J West (G building) (follow the green pathway).



Picture 1 The digestive tract.

Home Preparation

1. *Please stop the following medicine(s) _____ days before testing.
_____.
2. Your child should not have any vaccines within 1 week of the procedure.

Food and Drink – It is very important to follow these instructions exactly:

- Your child may have **CLEAR LIQUIDS up to 3 hours before surgery**. After that, he may have nothing else to drink. Clear liquids allowed are water, apple juice, Pedialyte, and Lemon–Lime soda.
- Your child may have breast milk up to 4 hours and formula up to 6 hours before surgery. Water or Pedialyte can be continued up to 3 hours before the procedure. **All other liquids, semi-liquids and solid foods MUST BE STOPPED 8 hours before the procedure.**
- **Gum, cough drops and hard candy are not allowed.** If your child has been chewing gum, **the procedure will be delayed 2 hours** from the time the gum is spit out. If the gum has been swallowed **the procedure will need to be re-scheduled at a later date.**
- **A nurse from the GI Center or Surgery Unit will call before the procedure to tell you when your child should stop eating.**
- Your child **should not** take aspirin, ibuprophen (Motrin® and Advil®) or naproxen (Aleve®) 1 week before the procedure and for 3 days after the procedure. Your child may take acetaminophen (Tylenol®).

Hospital Preparation

The Day of the Test

- A medical history will be taken and a physical exam will be done on your child.
- Any female who has started her menstrual periods or is 12 years of age or older will get a urine pregnancy test at the hospital the day of the procedure.
- An IV (intravenous catheter) will be inserted.
- Your child will be taken to Interventional Radiology or Surgery. You may go with him or her. The doctor will explain the test and get your consent.
- Catheter placement is scheduled at _____ o'clock.
- **A PARENT OR LEGAL GUARDIAN MUST BE WITH YOUR CHILD** to give information on the child's health. The parent or guardian will also sign consent forms for the test and for sedation or general anesthesia. If a parent or guardian cannot come, please have a phone number available where a doctor or nurse can reach one or the other at the time of the test.

Hospital Preparation, continued

- Your child's doctor and the anesthesiologist will decide the best way to sedate your child for this test.
- Your child will be connected to monitors so the nurse can check his or her heart rate, breathing and blood pressure during the test.

The day of the test

- You may stay with your child until time to place the catheter. Then you may wait in the IR (Interventional Radiology) waiting room or the Surgery waiting room.
- When your child is relaxed enough or asleep, a long, flexible plastic tube (motility catheter) will be placed. It goes through the nose, down the throat into the stomach and then into the small intestine. If your child has a G-tube, the G-tube opening (gastrostomy) may be used to place the catheter.
- X-ray pictures are used to place the tube in the right position. This tube will not interfere with breathing.
- If your child has had sedation, the nurse will come for you after the tube has been placed. The nurse will take you and your child to the GI motility room unless other directions are given. If your child has had general anesthesia, he will go to the Post Anesthesia Care Unit (PACU) until he is awake. Then he will go to the GI motility room unless other directions are given.

How the Test Is Done

- The motility catheter has sensors at regular intervals. The sensors measure the pressure in different areas of the stomach and small intestines.
- The manometry catheter is connected to a computer. Water is slowly pushed through each hole in the catheter. The computer records the pressures against the water as it tries to flow out of the catheter. Other types of catheters that do not have water passing through them may also be used to measure pressure.
- During the testing, we may try to increase the contractions of the intestines. Your child may be given medicines through the motility catheter or IV. We may also give food or medicine by mouth. After this, the recordings continue for another hour.
- From start to finish, the measurement of pressures usually takes 5 to 8 hours. Please bring any toys, hand-held video games or DVD movies your child enjoys to help pass the time.
- The test requires that the child stay in bed or be held.

Risks and Possible Complications

- There may be some discomfort or soreness from the catheter. We will try to keep your child as comfortable as possible during this procedure.
- If the catheter comes out by accident, the test may have to be stopped to put the catheter back into place.
- This test needs a certain amount of cooperation from the child. If it is too hard for your child to cooperate, we may have to stop the test.

If you have any questions, you may contact your child's doctor.