

# Antroduodenal (AD) Manometry: Parent Guide

## Antroduodenal (AD) Manometry:

The term “manometry” refers to the measurement of pressure. Antroduodenal (AD) manometry testing allows your doctor to measure the strength and organization of the squeeze (or contraction) of the antrum (part of the stomach) and first part of the small bowel, also known as the duodenum. Your doctor uses a special catheter to do the test. This catheter is a long and flexible tube with sensors that measure the intensity, length, and order of contractions in the stomach and small bowel. AD manometry testing usually requires an overnight hospital stay. You may be asked to discontinue some medications for a few days, prior to the test, and will not be able to eat or drink for 8 hours prior to your scheduled testing time.

## Preparation:

Our Motility Physician likes to meet patients and guardian(s) prior to the test. There will be an appointment completed either in clinic or via telehealth. During the appointment, your child’s medical history will be discussed, and an in-depth explanation of the Manometry Study will be provided.

Please check the email the motility nurse sent you in preparation for the study. It will contain info regarding preparation for the procedure and study. The motility nurse will obtain your child’s medical history and medications your child currently uses. Some medications alter the manometry study, therefore your child’s medication may be weaned or stopped to prepare for an accurate study.

Consider bringing your child’s favorite toys or games, your child will remain in bed once the catheter is placed and for the duration of the study. Reassure your child that you will be with them during the entire test (except during catheter placement due to them being sedated).

## Schedule Overview:

- **Day of Procedure and Admission (Wednesday)**
  - Before the Procedure:
    - **Hospital Address:** 100 Mario Capecchi Dr, Salt Lake City, UT 84113
    - You and your child will check in at the Children’s Procedure Center. Where they will be placed under sedation to complete an upper endoscopy, also known as an EGD (with biopsies), will be performed and a manometry catheter will be placed.
      - The catheter tube will enter through the nose, down the throat, & continue into the small intestine.
      - If your child has a G-Tube or GJ-Tube, placement may be done through the tube site instead of the nose.
    - An IV will be placed to receive fluids for hydration, since they will be unable to eat or drink. The IV will also be accessed to give anesthesia, to sedate your child during the procedure.

- After the Procedure:
  - As your child fully awakes from anesthesia it is important to assist your child in not pulling out the catheter
  - Your child will be admitted to the hospital overnight, in the Rapid Treatment Unit (RTU), also known as First North West (1NW).
  - Your child will **not be able to have anything by mouth** as this can alter the study. They will not be able to have oral medications, gum, mints, mouth swabs, etc. IV fluids will keep your child hydrated until the study is completed.
  - Your child will need to **remain in bed** for the remainder of Wednesday and Thursday.
  - Your child must use a bedpan, urinal, or diaper instead of using the restroom, due to possible dislodgement of the catheter.
  - For the remainder of the evening, your child will be free to do activities that they can do resting in bed. The study will begin the next morning, at approximately 8 AM.
- Day of the Study (Thursday)
  - AD Manometry Testing and Discharge Home!
    - The next morning, you will have an x-ray to make sure the catheter is still in the right place.
    - If it is, the nurse will come to your room and connect the manometry catheter to a computer and start the test (approx. 8am). The test is around six hours long and has three parts. It measures the squeeze of the bowel at rest, after eating (approx. 10am), and after medications (approx. 12pm & 1pm).
      - You will be instructed when to order a meal or start feeds by the nurse. Otherwise, the patient will just be hanging out and resting in bed. Do not allow your child to eat or drink. until instructed to do so by the manometry nurse.
      - For patients that receive tube feeds, the feed will be administered at a specified time.
    - Once the study is complete (approx. 2pm), the catheter will be removed, and patient will be discharged.

You may consider bringing your child's favorite toys or games as they will need to remain in bed after the catheter is placed and during the study

Reassure your child that you will be with them during the entire test (except during catheter placement, during which time your child will be sedated)

When the test is complete, the catheter is removed, and you can go home. The team will generally provide a plan for your medicines before you leave. Your doctor will let you know the results of the test within 1-2 weeks and make any changes to the care plan as needed.

# Parent's Frequently Asked Questions

## ***What is Antro-Duodenal (AD) Manometry?***

- AD manometry measures the pressure or contractions in parts of the stomach & small intestine to determine how well they work

## ***How is the manometry catheter placed?***

- A tube called a "manometry catheter" is placed through your child's nose which will extend to the small intestine. Your child is asleep during the placement of the catheters

## ***What will my child feel during the test?***

- This test does not cause pain. However, medications may cause nausea, vomiting, and belly cramping.
- After the study is complete, we remove the tape holding the catheter in place. Tape removal may be uncomfortable
- Removal of catheter is not painful
- Irritation may develop in the nose from the catheter

## ***Why can't we do the study on the same day that the manometry catheter is placed?***

- We conduct the AD manometry study the next day after catheter placement because the anesthesia needs to be out of the system prior to beginning the study. Anesthesia is used to help your child sleep during the procedure. Anesthesia can affect the results of the study

## ***Can my child have a sucker, hard candy or a swab after the catheter is placed?***

- No, this can cause activity in the large intestine which may affect the study

## ***What if my child is on TPN (Total parental nutrition)?***

- Your child will not require TPN while at the hospital. We will provide specific types of IV fluids that will keep your child's sugar stable and keep them hydrated. TPN can be started once they are discharged from the hospital

## ***What if my child has a G-Tube or a GJ-Tube?***

- We may use this port to give medications to assist with clean out. We may also use the site for catheter placement. Please inform the motility nurse that your child has a tube. The motility nurse will help coordinate the appointment for GJ-Tube replacement before discharge

## ***When will I receive the results of the study?***

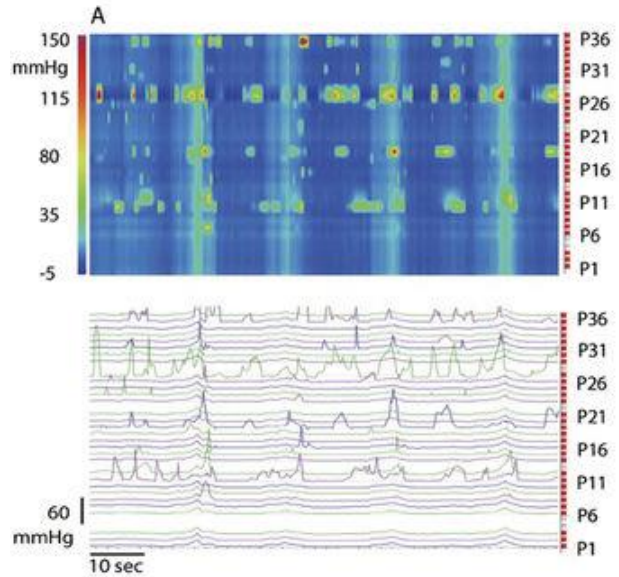
- The Motility Doctor will call you with results in approximately 1-2 weeks following the study and provide recommendations on how to further manage your child's care

## ***Who do I call if I have any questions?***

- Please call the motility nurse at 801-662-1619, option 2, option 2



Computer Cart



Pressure Tracings



Solid State  
Manometry Catheter



Water Perfused  
Manometry Catheter



Endoscope or  
Colonoscope