



UnityPoint Health

St. Luke's Hospital

St. Luke's Imaging Services Patient/Family Information

Computed Tomography Angiography (CTA)

What is computed tomography angiography (CTA)?

Computed tomography angiography or CTA is a valuable procedure which combines x-ray and computer technology to make a clear picture specifically of the blood vessels in the body.

The CTA exam involves tiny x-ray pictures, called "slices"; taken in a circular movement around the body while x-ray dye is injected through a vein. The computer pulls the slices together and puts them on a video monitor for the radiologist, a doctor who specializes in radiologic medicine. The image represents an image of an area of blood vessels in the body and can provide a "view" that may not be visible on a regular x-ray.

Special note:

Before the exam, please tell your doctor if you are or think you may be pregnant or nursing.

It is also important to inform the CT technologist if you have any allergies or have had a reaction to x-ray dye in the past.

Preparation:

You should not eat any solid food four (4) hours before your exam. You may, however, drink clear liquids, including water, tea, clear gelatin, lemon-lime soda, orange or grape punch (not juice) and broth. **If you are on any medications, you may take them prior to your test.** Your doctor may have other specific instructions for you.

Please bring your medication list with you to your exam.

If you are **60** years old or older, have diabetes, high blood pressure, kidney disease, or have undergone an exam within the previous seven days where contrast material (x-ray dye) was injected into your body, you will need to have a blood test before this procedure to check for kidney function.

What happens during the test?

An IV will be started in the vein of your arm to inject x-ray dye that is used during the exam to outline the blood vessels on the images.

You may be asked to undress and wear a hospital gown for the images. You will lie on your back with your arms above your head on a table that will be moved into the CT **machine** where the images will be taken. Except for the movement of the table, you should not feel anything.

You must remain as still as possible during this procedure, and you will be asked to hold your breath for 10 to 15 seconds as each scan is taken. It is important to do this for each scan. It is during this time that an x-ray dye may be injected through the IV. You may feel warm and flushed for a few minutes, which is very normal. However, if you should feel itchy, short of breath, or uncomfortable, please tell the CT technologist.

After the exam:

You may go back to your regular diet after the exam, unless otherwise directed by your doctor. You should drink plenty of fluids the rest of the day after receiving x-ray dye. The dye will go out through your urine and you will not be able to see it.

When will I know the results?

The radiologist will review and interpret the scan shortly after the exam is completed. A written report will be sent to your doctor. Your doctor will discuss these results with you.

Please allow your physician the time needed to review these results.