



## Tests to Diagnose a Stroke

### Blood Work

Some common blood tests are completed when you arrive to:

- find the reason for your stroke, for example blood clotting problems. If your blood clots too much you may have an ischemic stroke. If it doesn't clot enough you may have a hemorrhagic stroke.
- find a reason for your symptoms of stroke. For example, a high or a low blood sugar may be due to diabetes (a risk factor for stroke) or may be the reason for the symptoms you are having.
- determine if you are also having a heart attack. This happens in 10-15% of people.

### Imaging

1. **CT Scan (Head)** – a non-contrast CT scan that uses x-rays to produce a series of detailed images of your brain. The pictures will show damage to brain cells or bleeding from a stroke. It is important to stay very still to get clear pictures. There is a humming sound while the CT is operating. The CT takes 3 – 5 minutes.
2. **CTA** – is a CT scan that is done with a special dye that provides better images of the arteries that supply blood to your brain. CT can also detect blood clots that may be causing the stroke. The dye is injected into an intravenous line in your arm. You may get a warm feeling when the dye is injected.
3. **MRI** – uses a strong magnet and radio waves to get detailed pictures of the brain and brainstem. MRIs are often used to detect strokes that are not showing up on the CT or to get more information about the condition of the brain. Let your healthcare provider know if you have trouble in small spaces.
4. **Carotid or vertebral Dopplers** (ultrasound) – looks at the thickness of the carotid and/or vertebral artery wall. These arteries bring blood to the brain. The ultrasound will show if there is narrowing of the arteries.

### Tests of your Heart

- **ECG** – is used to look at the rhythm of your heart. An irregular rhythm such as atrial fib may cause clots to develop in the heart. These clots can break off and travel to the brain causing an ischemic stroke.
- **Echocardiogram** – is an ultrasound of the heart that looks at the structure of the heart and how well it works.