



# SICKLE CELL CLINIC

# Stroke

# If you think a patient is having a stroke, you need to call 911 immediately.

# What is a stroke?

Your brain needs a lot of oxygen all the time so it can work the right way. If a portion of your brain does not get oxygen, that portion of the brain can become injured or die, which is called a stroke. Since sickle cells can sometimes stop the blood flow of oxygen, patients with sickle cell disease are more at risk for stroke than others.

# How do I know if a patient is having a stroke?

Patients who are having a stroke may have some of the symptoms:

- Weakness in a body part, such as the leg, arm or even entire side of the body.
- Trouble speaking normally
- Severe headaches or dizziness
- Different facial appearance than normal, such as an abnormal smile
- Seizure

Strokes can also happen in areas of the brain that affect behavior or how well you learn.

### How is a stroke diagnosed?

- Strokes are a medical emergency.
- Call 911 so an ambulance can take you to the emergency room right away.
- It is vital to get treatment as soon as possible to minimize the long-term brain damage due to stroke.
- When you get to the emergency room, tell her doctor or nurse that the patient has sickle cell and may be having a stroke.
- The emergency doctor or nurse should view this as a medical emergency and have the patient be seen right away.
- To diagnose a stroke, the patient will have a CT scan or MRI, which is a test of pictures taken of the brain.

### How are strokes treated?

- Patients who have had a stroke need immediate red blood cell transfusion. This will try to get normal red blood cells into the patient and oxygen to the brain to prevent additional damage.
- A patient who has had a stroke requires monthly blood transfusions to prevent a 2nd stroke.
- If no therapy is done, we know that 70% of patients will have another stroke.
- Your doctors may also talk to you about therapies to prevent another stroke, such as bone marrow transplant.

### What happens to the body after a stroke?

- During a stroke, a patient may have symptoms which get better over time or are permanent.
- The patient may always have trouble walking, talking, or using muscles.
- Patients may benefit from physical therapy and occupational therapy.

### What can I do to prevent a stroke?

- Doctors can test a patient each year to determine if he/she is at risk for a stroke. This test is called transcranial Doppler (TCD)
- The test should be done at your yearly sickle cell clinic visit.
- It is an ultrasound machine that does not hurt you.
- It tells you how fast blood flow is going to the brain.
- People who are at risk for a stroke work to get their blood to the brain faster than normal.
- If a patient has a TCD that shows a risk for stroke, the patient will be placed on red blood cell transfusion therapy to improve the blood flow to the brain.
- We also believe that Hydroxyurea can decrease your risk of having a stroke.