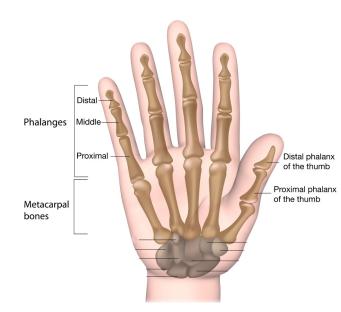
### PATIENT EDUCATION RESOURCE Hand Fractures



"Working with a knowledgeable hand therapist can make the difference between success and failure in complex hand surgical cases. The therapist extends the continuum of our care, as well as functioning as coach and trainer for our patients."

MARYBETH EZAKI, MD, PAST PRESIDENT, AMERICAN SOCIETY FOR SURGERY OF THE HAND



Bones of the hand

#### What is a hand fracture?

A fracture is a break in any bone. A fracture can range from a tiny hairline crack in the bone to a bone that has broken through the skin (called an open fracture). There are 19 bones in the finger, thumb and palm of the hand. A fracture of any of these is called a hand fracture.

## What are the symptoms of a hand fracture?

Fractures can cause pain, throbbing, swelling and bruising, and the finger might look deformed or out of place. There will also be limited motion or inability to move the fractured finger and also the other fingers. There might be some numbness



Finger fracture with swelling and bruising

with the fracture if the tiny nerves running along the sides of the finger have been stretched or injured.

#### What are the causes of a hand fracture?

Trauma or injury to the hand is the main cause of hand fractures. Injuries may occur from sports, workplace accidents or falls. A fracture occurs when there is enough force to break the bone, and may involve damage to other structures in the hand.

#### What is the treatment for a hand fracture?

If a fracture is suspected, the doctor will order an X-ray. The results of the X-ray will determine what kind of treatment is needed. There are three main types of treatment to help fractured bones heal. The first type is simple immobilization and protection. The second type is called a closed reduction in which the doctor sets or positions the fractured bone. The third type of treatment is called an open reduction in which surgery is performed and may include a pin, screw or plate to keep the fracture stable.

# What can a hand therapist do for me?

A hand therapist is extremely important in the rehabilitation of hand fractures. The therapist can fabricate a custom orthosis that provides proper positioning and allows the fracture to heal. Fingers become stiff very fast, and a hand therapist can instruct the patient in safe exercises that will prevent stiffness. The best outcome after a finger fracture is to have a fully healed fracture with a return of full motion, strength and hand function.



Custom-made orthosis for a hand fracture