

Casts, Splints and Braces for Immobilization

Why does my child's body part need to be immobilized?

Immobilization (holding in place) keeps a body part from moving while it heals. A splint, cast, or brace is used to hold the body part in 1 position. They support and protect broken bones, dislocated joints, and injured soft tissues such as tendons and ligaments.

What is a cast?

A **cast** is made of fiberglass, plaster, or both. A trained professional (usually an orthopedic tech) puts it on and takes it off.

- A Fiberglass cast is made from a type of plastic that can be easily shaped. Fiberglass is used most often and comes in different colors. The skin under the cast gets more air than it does in a plaster cast. It is also easier to X-ray through fiberglass than plaster.
- A plaster cast is made with strips or rolls of Plaster or Paris coated gauze.

How is a cast put on?

- A layer of padding is wrapped around your child's skin to cover the area and protect their skin. The Fiberglass or plaster is wet with water, put on over the padding and allowed to dry.
- Fiberglass usually dries in about 10 minutes, while plaster can take up to 1 day to completely dry.

What is a splint or a brace?

Both splints and braces are used for immobilization or support, although they give less support and protection than a cast. Splints and braces can be taken off, but sometimes the doctor will ask your child to wear it all the time.

- Splints or braces can be ready-made or custom made.
- Splints or braces are sometimes used after surgery is done on your child's arm or leg, or after an injury.
- Since splints or braces can be taken off and put back on, they are often used when your child needs to exercise their arm or leg while it's healing.
- Some splints or braces can be set so that the arm or leg can move.
- Sometimes splints or braces are worn just during sleep or during activities.
- Your doctor will tell you how your child should wear their splint or brace.

Can my child's cast get wet?

Casts cannot get wet! It is very important to keep the cast clean and dry.

- Cover the cast with a plastic bag and tape, or a cast cover if you think the cast might get wet.
- It is best to sponge bathe infants and small children with a cast, as well as children with a body cast.
- Your child should not take a shower. Bathing in a tub is best, if you can keep the cast out of the water.
- Casts must be covered if your child goes out in the rain and snow.

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- Sometimes, the doctor will allow your child to have a waterproof cast. A special padding is used under the cast, allowing the cast to get wet. Depending on your child's condition, it is often not possible to get a waterproof cast. If your child has a waterproof cast, it is okay to swim in a pool, shower or bathe.
 - Do not wash dishes with a casted arm.
 - No swimming in lakes, ponds, rivers, or oceans.
 - Once the cast is put under water, rinse the cast and skin thoroughly and then let the cast drain out thoroughly. Finally, blow dry the cast on cool setting to make sure the skin underneath the cast is dry.

What do we do if the cast does get wet?

- If the cast gets a little bit wet, dry as much as possible with a hair dryer on the cool setting.
- If the cast gets soaked, the skin under the cast might break down. The cast must be taken off and a new one put on. If you are unsure if the cast is wet, please call your program nurse or doctor.

Cast Tips:

- You can buy a cast cover from a pharmacy. These will help keep the cast clean and dry, but they won't keep the cast dry if it's fully submerged in water or used with swimming.
- Have your child move their fingers or toes often to keep them from swelling.
- Never put anything (objects, lotions or powders) inside the cast.
- For small children it is a good idea to cover their cast when they are eating.
- Don't pull the padding out of the cast or cut or trim the cast.
- For body casts on small children, put 2 diapers on to keep the cast from getting dirty.
- If the skin under the cast is itching, don't let your child scratch inside the cast. You can use a hair dryer on the cool setting or tap gently on the outside of the cast.

Call the doctor if your child has:

- Swelling or pain that doesn't go away after changing their position and elevating the body part with the cast, splint or brace, above the level of the heart.
- A cast that feels too tight or too loose.
- Skin near the cast that is not pink and warm.
- Numbness, tingling, or burning in the area of the cast, splint or brace that does not go away in a few minutes after changing their position and elevating the area.
- A feeling of pressure or pain in their heel
- A bad smell coming from the area of the cast, splint or brace.
- Something caught under their cast and you can't easily get it out
- Cracks or break down of their cast
- A fever over than 101.5 degrees Fahrenheit.

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For questions, concerns, or if your child is having problems with their cast, splint or brace, please call:

- 720-777-6600 during normal business hours (M-F).
- 720-777-1234 at all other times and ask for the Orthopedic Resident on call.