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Glossary

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This leaflet contains general information about phimosis. If you have any specific questions about an individual medical situation you should consult your doctor or other professional healthcare provider.

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Phimosis

What is phimosis?

Phimosis is the inability to pull the foreskin back over the head of the penis (glans).

The head of penis is covered by a tissue called the foreskin. The foreskin is usually loose and slides easily over the head of the penis. This movement allows the child to urinate or to become fully erect (in adolescents). Sometimes, though, the foreskin is too tight. It can close over the glans and become unable to move (Fig. 1). This condition is called phimosis.



Fig. 1: Phimosis.

How common is phimosis?

Phimosis affects only boys and is normal in infants and toddlers. If an infant's foreskin has not been removed surgically (circumcision), it is attached to the glans for the first few years. The foreskin typically separates between ages 2 and 6. Forcing your child's foreskin back can cause pain and damage. In most cases, it will detach naturally on its own.

Phimosis becomes less common with age. The foreskin can be pulled back behind the glans in about half of 1-year-old boys and in nearly 90% of 3-year-olds. Less than 1% of boys aged 16 – 18 years have phimosis.

What causes phimosis?

Phimosis is natural in very young male children. In older boys, it might be caused by damage or scarring. It is more likely to occur in boys with:

- · Urinary tract infections that keep coming back
- Infections of the foreskin
- · Repeated rough handling of the foreskin
- · Trauma that affected the foreskin

Symptoms and Diagnosis

Phimosis typically becomes a problem when symptoms occur. Symptoms include:

- · Redness, soreness, or swelling of the foreskin
- Ballooning of the foreskin while urinating
- Inability to fully pull back the foreskin by age 3 or older
- Inflammation of the head of the penis
- Thick discharge under the foreskin

If your child has any of these symptoms, take him to see the doctor.

The <u>diagnosis</u> of phimosis is relatively simple. The doctor will do a physical exam, which consists of assessment of your child's penis and testes. The doctor may ask some questions:

- How long have there been problems with the foreskin?
- Has the foreskin been red or sore?
- Does your child take any medication?
- Does your child have diabetes?

The doctor may ask parent(s) to be present or to help during the examination, particularly for younger children and infants.

Phimosis or agglutination?

Phimosis needs to be distinguished from <u>agglutination</u>, which is a rather common condition. With agglutination, some foreskin tissue stays attached to the glans (**Fig. 2**). This protects the infant's penis from direct contact with faeces and urine, which can cause irritation. Agglutination usually goes away on its own over time.



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Fig. 2: Agglutination.



Treatment

Phimosis is not life threatening, but the symptoms are uncomfortable. Treatments include:

- Topical steroid for phimosis without scarring
- Surgical removal of the foreskin (circumcision)

Figure 3 shows the decision-making process for treating phimosis. If your child has scarring from an earlier injury, circumcision is needed. If no scarring is present, your child might be able to use a steroid cream or ointment to loosen the tight foreskin.

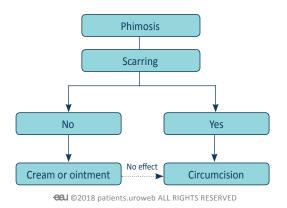


Fig. 3: Phimosis treatment.

Topical steroid

For boys who have phimosis without scarring, a steroid cream or ointment applied directly to the foreskin often works well. Your doctor will show you how to apply the ointment to the tight skin.

The ointment softens the foreskin when used every day for 4–8 weeks. Your doctor will also show you how to massage and manually stretch the foreskin. Once the foreskin can be pulled all the way back, use of the ointment can be stopped. This treatment has few or no side effects.

Circumcision

Sometimes treatment with a topical steroid does not work. In that case, the doctor may recommend circumcision.

Circumcision is a surgical procedure to remove the foreskin (**Fig. 4**). It is necessary to treat phimosis with scarring from previous injury. It can also treat phimosis that causes frequent infections of the foreskin or the urinary tract. Circumcision may be needed if your child's foreskin causes problems



Fig. 4: Uncircumcised and circumcised penises.

urinating. Sometimes the parent(s) might prefer that the child be circumcised after age 2 to prevent further problems.

Circumcision is not an option for some patients who have:

- Active problems with heart or lung function or a bleeding disorder
- Foreskin or glans that is actively infected
- Birth defects of the penis
- A penis that urinates through an opening on the underside rather that at the tip (hypospadias)
- A penis that is not visible or is inside the skin (buried penis; foreskin may be needed for a reconstructive procedure)

How is circumcision performed?

For circumcision in young boys, a numbing medication (local anaesthetic) will be used on the penis to reduce pain. Older boys and men who need circumcision will be asleep (general anaesthesia) for the procedure.

To remove the foreskin, the surgeon holds it with a grasper and cuts the skin away from the penis (Fig. 5). The skin below the glans is stitched to the skin of the shaft to heal. The wound is covered with gauze treated with petroleum jelly or antibiotic ointment.

Does it hurt?

In fact, circumcision is not a very painful procedure. Anaesthesia dulls pain during the surgery. Urination does not cause pain after surgery because the urethra (the tube that passes urine from the bladder) is not touched.



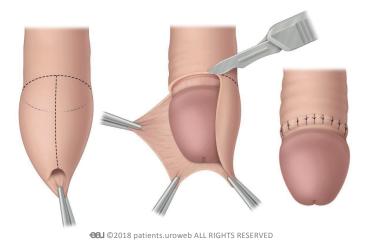


Fig. 5: Circumcision.

Recovery

Recovery from circumcision is usually quick:

- Infants, 12-24 hours
- Young children, 1-2 days
- · Older children and adults, 3-4 days

Very few patients have problems or side effects after circumcision. Light bleeding or discharge 2-3 days after surgery will stop on its own. Bruising or swelling of the penis skin can last for a few weeks. Treat with cold packs and nonsteroidal anti-inflammatory drugs (NSAIDs).

Sometimes not enough skin is removed, and another operation is needed. More serious problems like damage or major bleeding are very rare.

Contact your doctor after surgery if your child:

- · Has pus coming out of the wound
- Has a red, painful, or swollen penis
- Has bleeding that will not stop
- Urinates very little or not at all
- Begins to vomit or have seizures

Paraphimosis

<u>Paraphimosis</u> is an emergency that can happen only in uncircumcised boys. The tight foreskin is pulled back behind the head of the penis and becomes stuck (**Fig. 6**). It cannot be returned to its normal position. This leads to swelling of the head of the penis and the foreskin. In severe cases, blood cannot get to the head of the penis and can cause irreversible changes. Lack of oxygen and nutrients can lead to tissue necrosis, which is characterised as death of cells. In paraphimosis it can cause blackening and/or hardening of

the head of the penis that can eventually lead to structural changes.

Symptoms include:

- Swelling at the penis tip when the foreskin is pulled back
- Penile pain
- Not being able to move the foreskin back over the head of the penis
- Discoloration at the tip of the penis (skin is dark red or bluish)

Emergency treatment

The doctor will gently press the swollen tissue of the penis and try to move the tightened foreskin over the head of the penis. If this does not work, your doctor might:

- Inject the foreskin with the enzyme hyaluronidase to try to loosen the foreskin
- Make a small surgical cut to loosen the foreskin
- · Recommend an emergency circumcision

Living with phimosis

A tight foreskin (phimosis) results from the structure of the penis. It will not go away on its own, but it is not considered a problem unless symptoms occur. Cleaning under the foreskin will help prevent infection and keep the skin loose. If the foreskin becomes stuck and cannot be pulled back over the glans, contact your doctor immediately. If phimosis is treated with circumcision, the foreskin will be removed. No lingering effects are expected.



Fig. 6: Paraphimosis.



Glossary of terms

Agglutination

Adhesions of the foreskin to the glans that tend to resolve spontaneously

Anaesthesia

Medication administered before the start of a procedure to manage pain. Under general anaesthesia, you are unconscious and unaware of what is happening to you. Under spinal or local anaesthesia, you will not feel pain in the part of your body where the procedure is performed. Anaesthesia will gradually wear off.

Buried penis

The penis is not visible or is inside the skin

Circumcision

Surgical procedure during which foreskin is removed. It can be performed either under general or under spinal/local anaesthesia.

Diagnosis

The doctor and the nurse will do a series of tests to understand what causes your problems

Glans

The head of the penis

Hypospadias

An abnormality of the urethra (tube that the urine flows through out of the penis) that is present at birth. The urethra opens on the underside of the penis instead of at the tip.

Paraphimosis

The foreskin stuck in the retracted position behind the head of the penis. It is considered a medical emergency that requires immediate attention.

Phimosis

The inability to retract the foreskin over the head of the penis



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