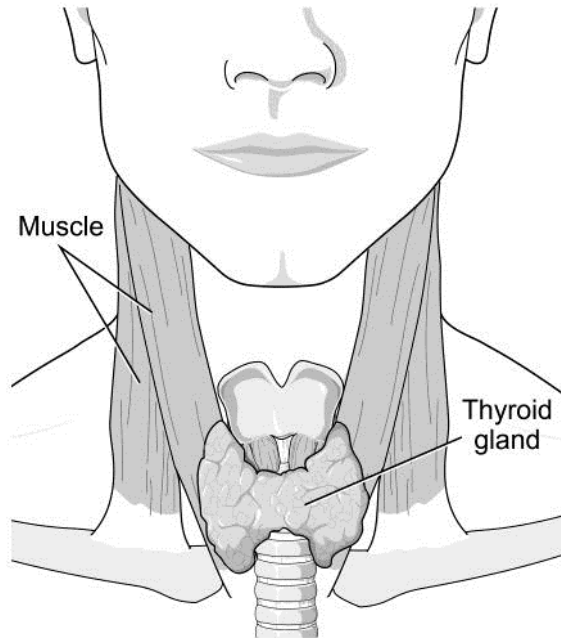


Congenital Hypothyroidism

Thyroid Gland

The thyroid is a butterfly-shaped gland in the front of the neck. Normal thyroid cells send out hormones, thyroxine (T4) and triiodothyronine (T3).



The brain sends a message to the thyroid (thyroid stimulating hormone, TSH) that makes these two hormones. The thyroid sends them into the bloodstream. The blood carries these hormones everywhere in your child's body.

Thyroid hormones affect almost every tissue and organ system to aid in body and brain growth and normal metabolism. The thyroid hormones act like the body's "gas pedal" because they affect the rates of growth, muscle movement, metabolism, and protein building.

Congenital Hypothyroidism

Newborn babies with an absent, under-developed, or under-active thyroid gland have congenital (which means born with) hypothyroidism (which means too little thyroid hormone). Without thyroid hormone, children cannot grow or develop as they should. We can prevent and treat these problems by finding and treating it early. In most cases, these children will require lifelong treatment.

Screening Tests

All newborn babies have standard screening tests that can detect congenital hypothyroidism. The tests measure one or two hormones.

- T4
- Thyroid stimulating hormone (TSH)-used in Wisconsin's newborn screen

Low levels of T4 and high levels of TSH suggest congenital hypothyroidism. Doctors may do a thyroid scan or an ultrasound exam to look at the size and location of the thyroid.

Causes

- Small thyroid gland
- Missing thyroid gland
- Thyroid gland that is in the wrong spot
- Problems with TSH controlling the thyroid gland
- Mother has thyroid disease or took medicine during pregnancy that can cause congenital hypothyroidism for a short time
- Problems making the thyroid hormone

Treatment

Hypothyroidism is treated with a thyroid hormone replacement pill. You need to give your child this pill the same time **every day** to help the brain develop. If you forget to give it at the normal time, give it later the same day or on top of the dose the next day.

You can crush the pill and give it to baby in a **small amount (a few teaspoons)** of formula, breast milk, or water using:

- A nipple detached from its bottle
- A medicine dropper
- An oral syringe

Do not use too much liquid. If the thyroid pill is put in a bottle the baby might only drink part of it and not get enough medicine. If you have any questions how to give the thyroid pill, please ask our team.

As your child grows, the dose of thyroid replacement may change. Blood tests for TSH and T4 will tell us when the dose needs to be changed. If you have any concerns about your child, call your pediatric endocrinology team.

Who to Call

Pediatric Endocrinology Clinic
Monday - Friday, 8:30 am - 4:30 pm
(608) 263-6420 (extension 3)

The toll-free number is **(800) 323-8942**. Ask for the Pediatric Endocrinology Clinic.

Your health care team may have given you this information as part of your care. If so, please use it and call if you have any questions. If this information was not given to you as part of your care, please check with your doctor. This is not medical advice. This is not to be used for diagnosis or treatment of any medical condition. Because each person's health needs are different, you should talk with your doctor or others on your health care team when using this information. If you have an emergency, please call 911. Copyright © 12/2024. University of Wisconsin Hospitals and Clinics Authority. All rights reserved. Produced by the Department of Nursing. HF#7140