

## Human Thyroid Stimulating Hormone (TSH)

Glycoprotein hormones alpha chain, Anterior pituitary glycoprotein hormones common subunit alpha, Fo Catalog # PBV11508r

Specification

## Human Thyroid Stimulating Hormone (TSH) - Product info

Primary Accession	<u>P01222</u>
Calculated MW	15 kDa KDa

#### Human Thyroid Stimulating Hormone (TSH) - Additional Info

Gene ID

**Other Names** 

Glycoprotein hormones alpha chain, Anterior pituitary glycoprotein hormones common subunit alpha, Follitropin alpha chain, Follicle-stimulating hormone alpha chain, FSH-alpha, Lutropin alpha chain, Luteinizing hormone alpha chain, LSH-alpha, Thyrotropin alpha chain, Thyroid-stimulating hormone alpha chain, TSH-alpha, Choriogonadotropin alpha chain, Chorionic gonadotrophin alpha subunit, CG-alpha, Thyrotropin subunit beta, Thyroid-stimulating hormone subunit beta, TSH-beta, TSH-B, Thyrotropin beta chain, Thyrotropin alfa

7252

Gene Source Source Assay&Purity Recombinant Target/Specificity TSHB

Human N/A SDS-PAGE;> 95% Yes

**Application Notes** 

Reconstitute in sterile H2O not less than 100  $\mu$ g/ml, which can then be further diluted to other aqueous solutions.

Format Lyophilized

Storage -20°C;Lyophilized from a concentrated (1.31mg/1ml) solution containing 50mM ammonium bicarbonate

## Human Thyroid Stimulating Hormone (TSH) - Protocols

Provided below are standard protocols that you may find useful for product applications.

- <u>Western Blot</u>
- Blocking Peptides
- <u>Dot Blot</u>
- Immunohistochemistry
- Immunofluorescence



- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

Human Thyroid Stimulating Hormone (TSH) - Images

# Human Thyroid Stimulating Hormone (TSH) - Background

Thyroid-stimulating hormone (also known as TSH or thyrotropin) is a hormone synthesized and secreted by thyrotrope cells in the anterior pituitary gland which regulates the endocrine function of the thyroid gland. TSH stimulates the thyroid gland to secrete the hormones thyroxine (T4) and triiodothyronine (T3). TSH production is controlled by a Thyrotropin Releasing Hormone, (TRH), which is manufactured in the hypothalamus and transported to the Anterior Pituitary gland, where it increases TSH production and release. Somatostatin is also produced by the hypothalamus, and has an opposite effect on the pituitary production of TSH, decreasing or inhibiting its release. The level of Thyroid hormones (T3 and T4) in the blood have an additional effect on the pituitary release of TSH, When the levels of T3 and T4 are low, the production is decreased. This effect creates a regulatory negative feedback loop. TSH is a glycoprotein and consists of two subunits, the alpha and the beta subunit. The a (alpha) subunit is identical to that of human chorionic gonadotropin (HCG), luteinising hormone (LH), follicle-stimulating hormone (FSH). The b (beta) subunit is unique to TSH, and therefore determines its function.