Thyroxine Binding Globulin (TBG) ELISA Kit for Mouse

PRODUCT OVERVIEW

Product Name	Thyroxine Binding Globulin (TBG), ELISA Kit
Full Product Name	Mouse Thyroxine Binding Globulin ELISA Kit
Product Gene Name	TBG elisa kit
Species Reactivity	Mouse
Assay Type	Sandwich
Preparation and Storage	Store all reagents at 2-8 degree C
Molecular Weight	46,325 Da
Chromosome Location	Chromosome: X; NC_000023.10 (105277190..105282718, complement). Location: Xq22.2
OMIM	314200
3D Structure	ModBase 3D Structure for P05543
Related Product Information for TBG elisa kit	MBS037026 is a ready-to-use microwell, strip plate ELISA (enzyme-linked immunosorbent assay) Kit for analyzing the presence of the Thyroxine Binding Globulin (TBG) ELISA Kit target analytes in biological samples. The concentration gradients of the kit standards or positive controls render a theoretical kit detection range in biological research samples containing TBG. The ELISA analytical biochemical technique of the MBS037026 kit is based on TBG antibody-TBG antigen interactions (immunosorbency) and an HRP colorimetric detection system to detect TBG antigen targets in samples. The ELISA Kit is designed to detect native, not recombinant, TBG. Appropriate sample types may include undiluted body fluids and/or tissue homogenates, secretions. Quality control assays assessing reproducibility identified the intra-assay CV (%) and inter-assay CV(%).
Other Notes	Small volumes of TBG elisa kit vial(s) may occasionally become entrapped in the seal of the product vial during shipment and storage. If necessary, briefly centrifuge the vial on a tabletop centrifuge to dislodge any liquid in the container`s cap. Certain products may require to ship with dry ice and additional dry ice fee may apply.

ADDITIONAL DETAILS

NCBI/Uniprot data below describe general gene information for TBG. It may not necessarily be applicable to this product.

NCBI GI #	205277441
NCBI GeneID	6906
NCBI Accession #	NP_000345.2
UniProt Primary Accession #	P05543
UniProt Secondary Accession #	D3DUX1
UniProt Related Accession #	P05543
GenBank Nucleotide #	NM_000354.5
NCBI Official Full Name	thyroxine-binding globulin
NCBI Official Synonym Full Names	serpin peptidase inhibitor, clade A (alpha-1 antiproteinase, antitrypsin), member 7
NCBI Official Symbol	SERPINA7
NCBI Official Synonym Symbols	TBG
UniProt Protein Name	Thyroxine-binding globulin

UniProt Synonym Protein Names	Serpin A7; T4-binding globulin
Protein Family	Thyroxine-binding globulin
UniProt Gene Name	SERPINA7
UniProt Synonym Gene Names	TBG
UniProt Entry Name	THBG_HUMAN
NCBI Protein Information	thyroxine-binding globulin; serpin A7; T4-binding globulin; thyroxin-binding globulin; serine (or cysteine) proteinase inhibitor, clade A (alpha-1 antiproteinase, antitrypsin), member 7
NCBI Summary for TBG	There are three proteins including thyroxine-binding globulin (TBG), transthyretin and albumin responsible for carrying the thyroid hormones thyroxine (T4) and 3,5,3'-triiodothyronine (T3) in the bloodstream. This gene encodes the major thyroid hormone transport protein, TBG, in serum. It belongs to the serpin family in genomics, but the protein has no inhibitory function like many other members of the serpin family. Mutations in this gene result in TGB deficiency, which has been classified as partial deficiency, complete deficiency, and excess, based on the level of serum TBG. Alternatively spliced transcript variants encoding different isoforms have been found, but the full-length nature of these variants has not been determined.[provided by RefSeq, Jun 2012]
UniProt Comments for TBG	SERPINA7: Major thyroid hormone transport protein in serum. Defects in SERPINA7 are a cause of thyroxine-binding globulin deficiency (TBG deficiency). Mutations in the SERPINA7 gene can result as a whole spectrum of deficiencies, characterized by either reduced or increased TBG levels in the serum. Patients show, respectively, reduced or elevated protein- bound iodine but are euthyroid. Belongs to the serpin family. Protein type: Secreted; Secreted, signal peptide Chromosomal Location of Human Ortholog: Xq22.2 Cellular Component: extracellular space; extracellular region Molecular Function: serine-type endopeptidase inhibitor activity; hormone binding Biological Process: response to drug; response to peptide hormone stimulus; response to corticosterone stimulus; aging; response to vitamin A; post-embryonic development
Research Articles on TBG	**1.** the TBG promoter has a role in sustaining transgene expression in liver-specific pattern
Precautions	All of MyBioSource's Products are for scientific laboratory research purposes and are not for diagnostic, therapeutics, prophylactic or in vivo use. Through your purchase, you expressly represent and warrant to MyBioSource that you will properly test and use any Products purchased from MyBioSource in accordance with industry standards. MyBioSource and its authorized distributors reserve the right to refuse to process any order where we reasonably believe that the intended use will fall outside of our acceptable guidelines.
Disclaimer	While every efforts were made to ensure the accuracy of the information provided in this datasheet, MyBioSource will not be liable for any omissions or errors contained herein. MyBioSource reserves the right to make changes to this datasheet at any time without prior notice. It is the responsibility of the customer to report product performance issues to MyBioSource within 30 days of receipt of the product. Please visit our Terms & Conditions page for more information.
Product Note	Select online data sheet information is drawn from bioinformatics databases, occasionally resulting in ambiguous or non-relevant product information. It is the responsibility of the customer to review, verify, and evaluate the information to make sure it matches their requirements before purchasing the kit. Our ELISA Kit assays are dynamic research tools and sometimes they may be updated and improved. If the format of this assay is important to you then please request the current manual or contact our technical support team with a presales inquiry before placing an order. We will confirm the current details of the assay. We cannot guarantee the sample manual posted online is the most current manual, it is intended to serve as an example only. Please refer to the instructions For Use provided with the assay kit for precise details.

For Research Use Only. Not for use in diagnostic or therapeutic procedures.

MyBioSource | Tel: +1.858.633.0165 | Fax: +1.858.633.0166 | mybiosource.com/contact-us
Online datasheet: https://www.mybiosource.com/tbg-mouse-elisa-kits/thyroxine-binding-globulin/37026