

ARG82853 Human GSTA1 ELISA Kit

Package: 96 wells
Store at: 4°C

Component

Cat. No.	Component Name	Package	Temp
ARG82853-001	Antibody-coated microplate	8 X 12 strips	4°C. Unused strips should be sealed tightly in the air-tight pouch.
ARG82853-002	Standard	2 X 10 ng/vial	4°C
ARG82853-003	Standard/Sample diluent	30 ml (Ready to use)	4°C
ARG82853-004	Antibody conjugate concentrate (100X)	1 vial (100 µl)	4°C
ARG82853-005	Antibody diluent buffer	12 ml (Ready to use)	4°C
ARG82853-006	HRP-Streptavidin concentrate (100X)	1 vial (100 µl)	4°C
ARG82853-007	HRP-Streptavidin diluent buffer	12 ml (Ready to use)	4°C
ARG82853-008	25X Wash buffer	20 ml	4°C
ARG82853-009	TMB substrate	10 ml (Ready to use)	4°C (Protect from light)
ARG82853-010	STOP solution	10 ml (Ready to use)	4°C
ARG82853-011	Plate sealer	4 strips	Room temperature

Summary

Product Description	ARG82853 Human GSTA1 ELISA Kit is an Enzyme Immunoassay kit for the quantification of Human GSTA1 in serum, plasma (EDTA, heparin) and cell culture supernatants.
Tested Reactivity	Hu
Tested Application	ELISA
Target Name	GSTA1
Conjugation	HRP
Conjugation Note	Substrate: TMB and read at 450 nm.
Sensitivity	78 pg/ml
Sample Type	Serum, plasma (EDTA, heparin) and cell culture supernatants.
Standard Range	156 - 10000 pg/ml
Sample Volume	100 µl
Precision	Intra-Assay CV: 4.8% Inter-Assay CV: 6.8%

Alternate Names	EC 2.5.1.18; Glutathione S-transferase A1; GSTA1-1; GST-epsilon; GST class-alpha member 1; GTH1; GST2; GST HA subunit 1
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Application Instructions

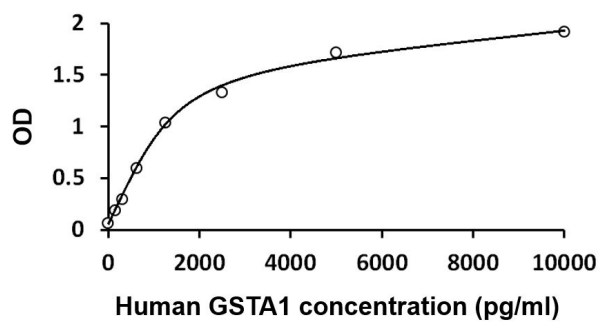
Assay Time	~ 5 hours
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Properties

Form	96 well
Storage instruction	Store the kit at 2-8°C. Keep microplate wells sealed in a dry bag with desiccants. Do not expose test reagents to heat, sun or strong light during storage and usage. Please refer to the product user manual for detail temperatures of the components.
Note	For laboratory research only, not for drug, diagnostic or other use.

Bioinformation

Gene Symbol	GSTA1
Gene Full Name	glutathione S-transferase alpha 1
Background	This gene encodes a member of a family of enzymes that function to add glutathione to target electrophilic compounds, including carcinogens, therapeutic drugs, environmental toxins, and products of oxidative stress. This action is an important step in detoxification of these compounds. This subfamily of enzymes has a particular role in protecting cells from reactive oxygen species and the products of peroxidation. Polymorphisms in this gene influence the ability of individuals to metabolize different drugs. This gene is located in a cluster of similar genes and pseudogenes on chromosome 6. Alternative splicing results in multiple transcript variants. [provided by RefSeq, Jan 2016]
Function	Glutathione S-transferase that catalyzes the nucleophilic attack of the sulfur atom of glutathione on the electrophilic groups of a wide range of exogenous and endogenous compounds (Probable). Involved in the formation of glutathione conjugates of both prostaglandin A2 (PGA2) and prostaglandin J2 (PGJ2) (PubMed:9084911). It also catalyzes the isomerization of D5-androstene-3,17-dione (AD) into D4-androstene-3,17-dione and may therefore play an important role in hormone biosynthesis (PubMed:11152686). Through its glutathione-dependent peroxidase activity toward the fatty acid hydroperoxide (13S)-hydroperoxy-(9Z,11E)-octadecadienoate/13-HPODE it is also involved in the metabolism of oxidized linoleic acid (PubMed:16624487). [UniProt]
Cellular Localization	Cytoplasm. [UniProt]



ARG82853 Human GSTA1 ELISA Kit standard curve image

ARG82853 Human GSTA1 ELISA Kit results of a typical standard run with optical density reading at 450 nm.