

DESCRIPTION

Species Reactivity	Human
Specificity	Detects human LRG1 in direct ELISAs and Western blots.
Source	Polyclonal Sheep IgG
Purification	Antigen Affinity-purified
Immunogen	Human embryonic kidney cell line HEK293-derived recombinant human LRG1 Val36-Gln347 Accession # P02750
Formulation	Lyophilized from a 0.2 µm filtered solution in PBS with Trehalose. See Certificate of Analysis for details. *Small pack size (-SP) is supplied either lyophilized or as a 0.2 µm filtered solution in PBS.

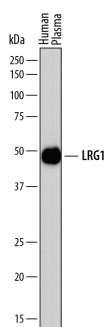
APPLICATIONS

Please Note: Optimal dilutions should be determined by each laboratory for each application. [General Protocols](#) are available in the Technical Information section on our website.

	Recommended Concentration	Sample
Western Blot	2 µg/mL	See Below
Immunohistochemistry	5-15 µg/mL	See Below

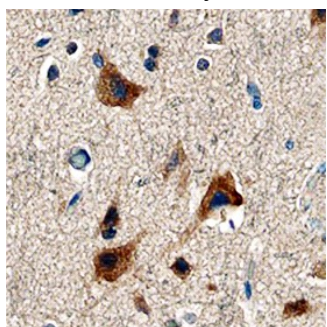
DATA

Western Blot



Detection of Human LRG1 by Western Blot. Western blot shows human plasma. PVDF membrane was probed with 2 µg/mL of Sheep Anti-Human LRG1 Antigen Affinity-purified Polyclonal Antibody (Catalog # AF7890) followed by HRP-conjugated Anti-Sheep IgG Secondary Antibody (Catalog # HAF016). A specific band was detected for LRG1 at approximately 48-50 kDa (as indicated). This experiment was conducted under reducing conditions and using Immunoblot Buffer Group 1.

Immunohistochemistry



LRG1 in Human Brain. LRG1 was detected in immersion fixed paraffin-embedded sections of human brain (cortex) using Sheep Anti-Human LRG1 Antigen Affinity-purified Polyclonal Antibody (Catalog # AF7890) at 3 µg/mL overnight at 4 °C. Tissue was stained using the Anti-Sheep HRP-DAB Cell & Tissue Staining Kit (brown; Catalog # CTS019) and counterstained with hematoxylin (blue). Specific staining was localized to neurons. View our protocol for [Chromogenic IHC Staining of Paraffin-embedded Tissue Sections](#).

PREPARATION AND STORAGE

Reconstitution	Reconstitute at 0.2 mg/mL in sterile PBS.
Shipping	The product is shipped at ambient temperature. Upon receipt, store it immediately at the temperature recommended below. *Small pack size (-SP) is shipped with polar packs. Upon receipt, store it immediately at -20 to -70 °C
Stability & Storage	Use a manual defrost freezer and avoid repeated freeze-thaw cycles. <ul style="list-style-type: none"> 12 months from date of receipt, -20 to -70 °C as supplied. 1 month, 2 to 8 °C under sterile conditions after reconstitution. 6 months, -20 to -70 °C under sterile conditions after reconstitution.

BACKGROUND

LRG-1 (Leucine-Rich alpha-2-Glycoprotein 1; also LRHG [in rodent]) is a 45-55 kDa, monomeric, variably glycosylated, secreted protein member of the leucine-rich repeat family of molecules. It should not be confused with either LRIG-1/ Leucine-Rich repeats and Ig-like domains-1, or LRG1/LIM-RhoGap protein 1. LRG-1 has a limited expression pattern, being associated with neutrophils, neutrophil precursors (myelocytes; metamyelocytes), astrocytes, HEV (in mice), hepatocytes and select tumor cells. LRG-1 is reported to bind multiple molecules, including TGF-β, extracellular cytochrome C, and fibronectin plus collagen IV of the ECM. Functions associated with this binding include granulocyte maturation, protection from apoptosis, and cell migration. Mature human LRG-1 is 312 amino acids (aa) in length (aa 35-347). Depending upon the source, LRG-1 has been described as having either thirteen 24 aa leucine-rich repeats (LRRs), or eight LRRs spanning aa 93-282 coupled to a C-terminal LRR. Variable O- and N-based glycosylation accounts for the variability in MW. Mature human LRG-1 shares 66% aa sequence identity with mouse LRG-1.