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# S100b antibody - N-terminal region

Rabbit Polyclonal Antibody
Catalog # AI10571

## Product Information

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| **Application** | WB |
| **Primary Accession** | P04631 |
| **Other Accession** | NM_013191, NP_037323 |
| **Reactivity** | Human, Mouse, Rat, Dog, Bovine |
| **Predicted** | Human, Mouse, Rat, Chicken, Dog, Bovine |
| **Host** | Rabbit |
| **Clonality** | Polyclonal |
| **Calculated MW** | 10744 |

## Additional Information

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| **Gene ID** | 25742 |
| **Alias Symbol** | MGC93559, S100P |
| **Other Names** | Protein S100-B, S-100 protein beta chain, S-100 protein subunit beta, S100 calcium-binding protein B, S100b |
| **Format** | Liquid. Purified antibody supplied in 1x PBS buffer with 0.09% (w/v) sodium azide and 2% sucrose. |
| **Reconstitution & Storage** | Add 50 ul of distilled water. Final anti-S100b antibody concentration is 1 mg/ml in PBS buffer with 2% sucrose. For longer periods of storage, store at 20°C. Avoid repeat freeze-thaw cycles. |
| **Precautions** | S100b antibody - N-terminal region is for research use only and not for use in diagnostic or therapeutic procedures. |

## Protein Information

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| **Name** | S100b {ECO:0000303\|PubMed:19910580, ECO:0000312\|RGD:3615} |
| **Function** | Small zinc- and- and calcium-binding protein that is highly expressed in astrocytes and constitutes one of the most abundant soluble proteins in brain (PubMed:14621986, PubMed:15823027, PubMed:18949447, PubMed:20351179). Weakly binds calcium but binds zinc very tightly-distinct binding sites with different affinities exist for both ions on each monomer (PubMed:15823027). Physiological concentrations of potassium ion antagonize the binding of both divalent cations, especially affecting high-affinity calcium-binding sites (By similarity). Acts as a neurotrophic factor that promotes astrocytosis and axonal proliferation (By similarity). Involved in innervation of thermogenic adipose tissue by acting as an adipocyte-derived |

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| | neurotrophic factor that promotes sympathetic innervation of adipose tissue (By similarity). Binds to and initiates the activation of STK38 by releasing autoinhibitory intramolecular interactions within the kinase (By similarity). Interaction with AGER after myocardial infarction may play a role in myocyte apoptosis by activating ERK1/2 and p53/TP53 signaling (PubMed:19910580). Could assist ATAD3A cytoplasmic processing, preventing aggregation and favoring mitochondrial localization (By similarity). May mediate calcium-dependent regulation on many physiological processes by interacting with other proteins, such as TPR-containing proteins, and modulating their activity (By similarity). |
| **Cellular Location** | Cytoplasm {ECO:0000250\|UniProtKB:P04271}. Nucleus {ECO:0000250\|UniProtKB:P04271}. Secreted {ECO:0000250\|UniProtKB:P50114}. Note=Secretion into the medium is promoted by interaction with isoform CLSTN3beta of CLSTN3 {ECO:0000250\|UniProtKB:P50114} |
| **Tissue Location** | Although predominant among the water-soluble brain proteins, S100 is also found in a variety of other tissues |

## Images