

Produktinformation



Forschungsprodukte & Biochemikalien



Zellkultur & Verbrauchsmaterial



Diagnostik & molekulare Diagnostik



Laborgeräte & Service

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Lieferung & Zahlungsart

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PRODUCT INFORMATION



Guanylate Cyclase α subunit (soluble) Polyclonal Antibody

Item No. 160895

Overview and Properties

This vial contains 500 µl of peptide affinity-purified polyclonal antibody. Contents:

Synonyms: GUCY1A1, sGC α₁ subunit

Immunogen: Peptide from the internal region of human protein Species Reactivity: (+) Human, bovine, and mouse; other species not tested

O02108 **Uniprot No.:** Form: Liquid

-20°C (as supplied) Storage:

Stability: ≥3 years

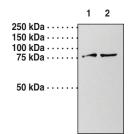
Storage Buffer: PBS, pH 7.2, with 50% glycerol and 0.02% sodium azide

Host:

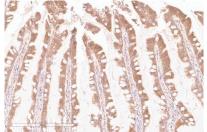
Western blot (WB) and Immunohistochemistry (IHC); the recommended starting Application:

> dilution for WB is 1:200 and 1:80 for IHC. Other applications were not tested, therefore optimal working concentration/dilution should be determined empirically.

Image



Lane 1: Mouse lung 10,000 g supernatant (40 µg) Lane 2: Mouse lung 10,000 g supernatant (70 µg)



paraffin-embedded (FFPE) human small intestine tissue after heat-induced antigen retrieval in pH 6.0 citrate buffer. After incubation with Cayman's Guanylate Cyclase α subunit (soluble) Polyclonal Antibody, (Item No. 160895), at a 1:80 dilution, slides were incubated with biotinylated secondary antibody, followed by alkaline phosphatase-streptavidin and chromogen (DAB)

WARNING
THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

SAFETY DATA
This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the complete Safety Data Sheet, which has been sent via email to your institution.

WARRANTY AND LIMITATION OF REMEDY

Buyer agrees to purchase the material subject to Cayman's Terms and Conditions. Complete Terms and Conditions including Warranty and Limitation of Liability information can be found on our website

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CAYMAN CHEMICAL

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PRODUCT INFORMATION



Description

Soluble guanylate cyclase is a heterodimeric enzyme, composed of α and β subunits, that synthesizes cGMP from GTP. The enzyme is activated by the binding of nitric oxide or carbon monoxide to the heme group of the enzyme.¹ Chronic hypoxia upregulates soluble guanylate expression in rat lung.² The α_1 subunit contains 690-717 amino acids and has a molecular mass of 77-82 kDa.³⁻⁵ The cloned β_1 subunit of guanylate cyclase from human, bovine, and rat sources contains 619 amino acids and has a molecular mass of approximately 70,000.^{3,6,7}

References

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- 3. Giuili, G., Scholl, U., Bulle, F., *et al.* Molecular cloning of the cDNAs coding for the two subunits of soluble guanylyl cyclase from human brain. *FEBS Lett.* **304(1)**, 83-88 (1992).
- 4. Nakane, M., Arai, K., Saheki, S., et al. Molecular cloning and expression of cDNAs coding for soluble guanylate cyclase from rat lung. *J. Biol. Chem.* **265(28)**, 16841-16845 (1990).
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- 6. Koesling, D., Herz, J., Gausepohl, H., et al. The primary structure of the 70 kDa subunit of bovine soluble guanylate cyclase. FEBS Lett. 239(1), 29-34 (1988).
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