

# Produktinformation



Forschungsprodukte & Biochemikalien



Zellkultur & Verbrauchsmaterial



Diagnostik & molekulare Diagnostik



Laborgeräte & Service

Weitere Information auf den folgenden Seiten! See the following pages for more information!



## Lieferung & Zahlungsart

siehe unsere Liefer- und Versandbedingungen

# Zuschläge

- Mindermengenzuschlag
- Trockeneiszuschlag
- Gefahrgutzuschlag
- Expressversand

### SZABO-SCANDIC HandelsgmbH

Quellenstraße 110, A-1100 Wien

T. +43(0)1 489 3961-0

F. +43(0)1 489 3961-7

mail@szabo-scandic.com

www.szabo-scandic.com

linkedin.com/company/szaboscandic in







### GRO-alpha (CXCL1), human recombinant (rHuGRO-a)

Catalog No: 94867 Lot No: XXXXX Source: *E. coli* 

**Synonyms:** Growth-regulated protein alpha, CXCL1, Melanoma growth stimulatory activity, MGSA, Neutrophil-

activating protein 3, NAP-3, GRO-alpha (1-73), chemokine (C-X-C motif) ligand 1, GRO1, GROa, SCYB1,

MGSA-a, MGSA alpha

#### **Background**

Chemokine (C-X-C motif) ligand 1 (CXCL1) is a small cytokine belonging to the CXC chemokine family that was previously called GRO1 oncogene, Neutrophil-activating protein 3 (NAP-3) and melanoma growth stimulating activity, alpha (MSGA-a). It is secreted by human melanoma cells, has mitogenic properties and is implicated in melanoma pathogenesis. CXCL1 is expressed by macrophages, neutrophilsand epithelial cells, and has neutrophil chemoattractant activity. CXCL1 plays a role in spinal cord development by inhibiting the migration of oligodendrocyte precursors and is involved in the processes of angiogenesis, inflammation, wound healing, and tumorigenesis. This chemokine elicits its effects by signaling through the chemokine receptor CXCR2. The gene for CXCL1 is located on human chromosome 4 amongst genes for other CXC chemokines.

#### Description

GRO-alpha human recombinant produced in *E. coli* is a single,non-glycosylated, polypeptide chain containing 73 amino acids and having a molecular mass of 7811 Dalton. GRO-alpha is purified by proprietary chromatographic techniques.

#### **Physical Appearance**

Sterile filtered white lyophilized (freeze-dried) powder.

#### **Formulation**

Lyophilized from a 0.2 µm filtered concentrated (1 mg/ml) solution in 20 mM PB, pH 7.4, 50 mM NaCl.

#### Solubility

It is recommended to reconstitute the lyophilized CXCL1 in sterile 18 M $\Omega$ -cm H $_2$ O not less than 100  $\mu$ g/ml, which can then be further diluted to other aqueous solutions.

#### Stability

Lyophilized GRO-alpha, although stable at room temperature for 3 weeks, should be stored desiccated below -18°C. Upon reconstitution CXCL1 should be stored at 4°C between 2-7 days and for future use below -18°C. For long term storage it is recommended to add a carrier protein (0.1% HSA or BSA). Please prevent freeze-thaw cycles.

#### **Purity**

Greater than 97.0% as determined by (a) Analysis by RP-HPLC, (b) Analysis by SDS-PAGE.

#### **Amino Acid Sequence**

The sequence of the first five N-terminal amino acids was determined and was found to be Ala-Ser-Val-Ala-Thr.

#### **Activity**

Determined by its ability to chemoattract human peripheral blood neutrophils using a concentration range of 10.0 - 100.0 ng/ml.





#### Usage

This product is offered by Biomol for research purposes only. Not for diagnostic purposes or human use. It may not be resold or used to manufacture commercial products without written approval of Biomol GmbH.