

# Product Data Sheet

## GFRA1/GDNFR-alpha-1 Protein, Mouse (HEK293, His)

Cat. No.:	HY-P76360		
Synonyms:	GDNF family receptor alpha-1; GFR-alpha-1; GDNFRA; TRNR1		
Species:	Mouse		
Source:	HEK293		
Accession:	P97785-2 (D25-S425)		
Gene ID:	14585		
Molecular Weight:	55-65 kDa.		

### PROPERTIES

AA Sequence	DRLDCVKASD	QCLKEQSCST	KYRTLRQCVA	GKETNFSLTS		
	GLEAKDECRS	AMEALKQKSL	YNCRCKRGMK	KEKNCLRIYW		
	SMYQSLQGND	LLEDSPYEPV	NSRLSDIFRA	VPFISVEHIS		
	KGNNCLDAAK	АСNLDDTCKK	YRSAYITPCT	T S M S N E V C N R		
	RKCHKALRQF	F D K V P A K H S Y	GMLFCSCRDV	ACTERRRQTI		
	VPVCSYEERE	R P N C L N L Q D S	CKTNYICRSR	LADFFTNCQP		
	ESRSVSNCLK	ENYADCLLAY	SGLIGTVMTP	NYIDSSSLSV		
	A P W C D C S N S G	NDLEDCLKFL	NFFKDNTCLK	NAIQAFGNGS		
	DVTMWQPAPP	νφτττατττ	AFRIKNKPLG	PAGSENEIPT		
	HVLPPCANLQ	AQKLKSNVSG	STHLCLSDND	YGKDGLAGAS		
	S					
Distantial Astron		25	L'ALMA AN CEDAT (CDNE)			
Biological Activity	Immobilized Mouse GNDF at 25 ng/mL (100 μL/well) can bind Mouse GFRA1/GDNFR-alpha-1 Protein. The ED <sub>50</sub> for this effec					
	is 0.3750 μg/mL.					
Appearance	Lyaphilized powder					
Appearance						
Formulation	Lyophilized from a 0.2 um filtered solution of PBS_pH 7.4					
ronnutation						
Endotoxin Level	<1 FU/ug determined by LAL method					
Endotoxin Lever						
Reconsititution	It is not recommended to reconstitute to a concentration less than 100 $\mu$ g/mL in ddH <sub>2</sub> O. For long term storage it is					
Reconstitution						
	recommended to add a carrier protein (0.1% DSA, 5% DSA, 10% PDS of 5% frendiose).					
Storage & Stability	Stored at -20°C for 2 years. After reconstitution, it is stable at $4^{\circ}$ C for 1 week or -20°C for longer (with carrier protein). It is					
Storage & Stability	recommended to freeze aliquots at -20°C or -80°C for extended storage					
	recommended to neeze digt		Attended Storage.			
Shipping	Room temperature in continental US: may vary elsewhere.					

## DESCRIPTION

#### Background

GFRA1, known as GDNFR-alpha-1, operates as a pivotal receptor for glial cell line-derived neurotrophic factor (GDNF). Its functional significance lies in mediating the GDNF-induced autophosphorylation and activation of the RET receptor. In this molecular interplay, two molecules of GDNFR-alpha are proposed to intricately engage with the disulfide-linked GDNF dimer, forming a complex alongside two molecules of RET. This interaction with RET underscores GFRA1's role in orchestrating signaling cascades critical for cellular responses. Moreover, GFRA1 exhibits additional complexities in its interactions, forming complexes with SORL1, either independently or alongside GDNF. Notably, the interaction between SORL1 and GFRA1 results in the internalization of GFRA1 without degradation, adding a layer of regulatory sophistication to its cellular functions.

#### Caution: Product has not been fully validated for medical applications. For research use only.

 Tel: 609-228-6898
 Fax: 609-228-5909
 E-mail: tech@MedChemExpress.com

 Address: 1 Deer Park Dr, Suite Q, Monmouth Junction, NJ 08852, USA