

CYR61, Human Recombinant

CATALOG #: 7131-10 10 µg
7131-50 50 µg

ALTERNATE NAMES: CCN1, G1G1 protein

SOURCE: E.coli

PURITY: ≥ 95% by SDS-PAGE gel and HPLC analyses

MOL. WEIGHT: 39.4 kDa

ENDOTOXIN LEVEL: < 0.1 ng/µg of protein (<1EU/µg).

FORM: Lyophilized

FORMULATION: Sterile filtered through a 0.2 micron filter. Lyophilized from 10 mM Sodium Citrate, pH 3.0 and 50 mM NaCl.

STORAGE CONDITIONS: Store at -20°C. After reconstitution, aliquot and store at -20°C to -80°C. Avoid repeated freezing and thawing cycles.

RECONSTITUTION:
Centrifuge the vial prior to opening. Reconstitute in water to a concentration of 0.1-1.0 mg/ml. Do not raise to neutral pH. Do not vortex. This solution can be stored at 2-8°C for up to 1 week. For extended storage, it is recommended to further dilute in a buffer containing a carrier protein (example 0.1% BSA) and store in working aliquots at -20°C to -80°C.

DESCRIPTION:
CYR61 is a member of the CCN family of secreted cysteine rich regulatory proteins. CYR61 induces angiogenesis by stimulating the proliferation, migration, and adhesion of endothelial cells. Cell migration and adhesion are mediated through binding to specific cell surface integrins and to heparin sulfate proteoglycans. Increased expression of CYR61 is associated with several types of cancer, and correlates with the progression and estrogen independence of human breast cancers. Recombinant human CYR61 is a 39.4 kDa protein containing 357 amino acid residues. It is composed of four distinct structural domains (modules); the IGF binding protein (IGFBP) domain, the von

Willebrand Factor C (VWFC) domain, the Thrombospondin type-I (TSP type-1) domain, and a C-terminal cysteine knot-like domain (CTCK).

BIOLOGICAL ACTIVITY:
Determined by the dose-dependent stimulation of the proliferation of murine 3T3 cells. The expected ED₅₀ for this effect is 2.0-3.0 µg/ml.

AMINO ACID SEQUENCE:

MTCPAACHCP	LEAPKCAPGV	GLVRDGCGCC	KVCAKQLNED	CSKTQPCDHT
KGLECNFGAS	STALKGICRA	QSEGRPCEYN	SRIYQNGESF	QPNCKHQCTC
IDGAVGCIPL	CPQELSLPNL	GCPNPRLVKV	TGQCCEEWVC	DEDSIKDPME
DQDGLLGKEL	GFDASEVELT	RNNELIavgk	GSSLKRLPVF	GMEPRILYNP
LQGQKcivqt	TSWSQCSKTC	GTGISTRVTN	DNPECRLVKE	TRICEVRPCG
QPVYSSLKKG	KKCSKTKKSP	EPVRFYAGC	LSVKKYRPKY	CGSCVDGRCC
TPQLTRTVKM	RFRCEDGETF	SKNVMMIQSC	KCNYNCPHAN	EAAPFYRLF
NDIHKFRD				

- RELATED PRODUCTS:**
- Cyr61 Antibody (Cat. No. 3648-100)
 - Cyr61 Blocking Peptide (Cat. No. 3648BP-50)

FOR RESEARCH USE ONLY! Not to be used in humans.

