

ProQinase™ MAPKAPK5 (non activated)

mitogen-activated protein kinase-activated protein kinase 5

Recombinant Human Protein Kinase

HGNC Symbol: MAPKAPK5

Synonyms: PRAK

Product No.: 0380-0000-1

Lot: 001

Description: Human MAPKAPK5

Amino acids M₁-Q₄₇₃ (as in NCBI/Protein entry NP_620777.1)*, N-terminally fused to GST-HIS₆-Thrombin cleavage site

Product identity: MAPKAPK5, Lot 001, was confirmed as MAPKAPK5 by specific Western Blotting using anti MAPKAPK5 antibody

Theoretical MW_{Fusion Protein}: 84,116 Da

Expression: Baculovirus infected Sf9 cells

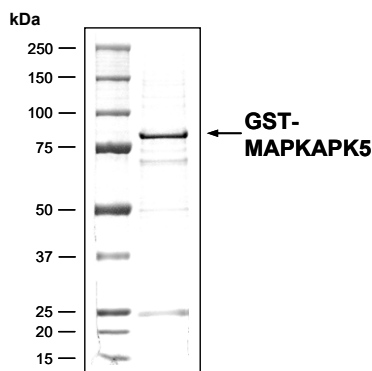
Purification: One-step affinity purification using GSH-agarose

Storage buffer: 50 mM Tris-HCl, pH 8.0; 100 mM NaCl, 5 mM DTT, 4 mM reduced glutathione, 20% glycerol

Storage temperature: -80°C
Avoid repeated freeze-thaw cycles!

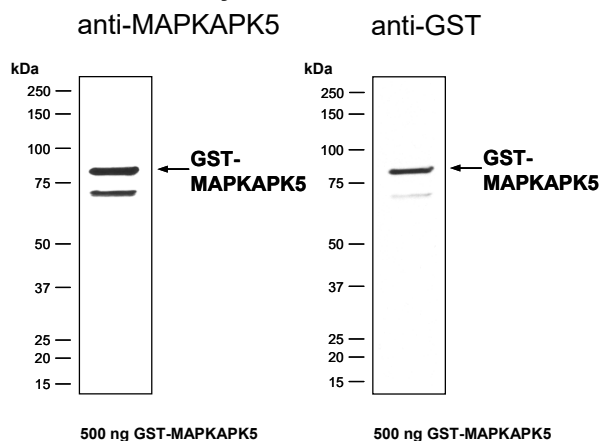
Protein concentration: 0.113 µg/µl (Bradford method using BSA [Sigma, cat# A-7638, Lot 79H7641] as standard protein)

Coomassie stain:

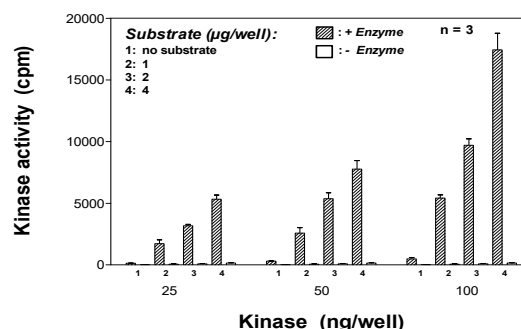
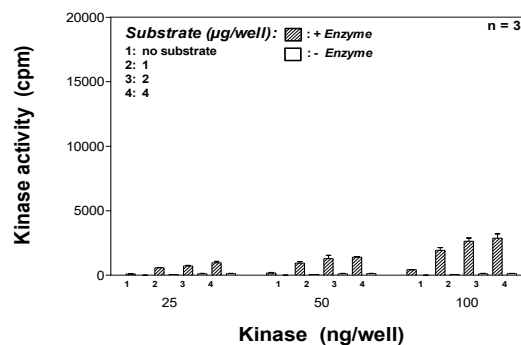


2.0 µg GST-MAPKAPK5

MAPKAPK5 Lot 001: Western blot analysis



Kinase activity MAPKAPK5 (not activated) vs active MAPKAPK5:



Final assay concentrations:

- 60 mM HEPES-NaOH, pH 7.5
- 3 mM MgCl₂
- 3 mM MnCl₂
- 3 µM Na-orthovanadate
- 1.2 mM DTT
- 50 µg / ml PEG_{20,000}
- 1 µM ATP (798,000 cpm ³³P-γ-ATP)
- Substrate (variable): ATF2
- Recombinant MAPKAPK5 (not activated) or active MAPKAPK5 (variable)

Assay: ³³PanQinase® Assay

Recombinant Proteins

ProQinase™ MAPKAPK5

Product No.: 0380-0000-1

MAPKAPK5 Recombinant Fusion Protein Amino Acid Sequence							
1	MSPILGYWKI	KGLVQPTRL	LEYLEEKYEE	HLYERDEGDK	WRNKKFELGL	EFPNLPYYID	60
61	GDVKLTQSMA	IIRYIADKHN	MLGGCPKERA	EISMLEGAVL	DIRYGVSRIA	YSKDFETLKV	120
121	DFLSKLPPEML	KMFEDRLCHK	TYLNGDHVTH	PDFMLYDALD	VVLYMDPMCL	DAFPKLVCFK	180
181	KRIEAIPOID	KYLKSSKYIA	WPLQGWQATF	GGGDHPPKSD	PMGHHHHHHG	RRRASVAAGI	240
241	LVPRGSPGLD	GIYARGIQAS	MSEESDMDKA	IKETSILEEY	SINWTQKLG	GISGPVRVCV	300
301	KKSTQERFAL	KILLDRPKAR	NEVRLHMMCA	THPNIVQIIE	VFANSVQFP	ESSPRARLLI	360
361	VMEMMEGGEL	FHRISQHRHF	TEKQASQVTK	QIALALRHCH	LLNIAHRDLK	PENLLFKDNS	420
421	LDAPVKLCDF	GFAKIDQGD	MTPQFTPYV	APQVLEAQR	HQKEKSGIIP	TSPTPYTYNK	480
481	SCDLWSLGI	IYVMLCGYP	FYSKHSRTI	PKDMRRKIMT	GSFEFPEE	SQISEMAKDV	540
541	VRKLLKVKPE	ERLTIEGVLD	HPWLNSTEAL	DNVLPQAQLM	MDKAVVAGIQ	QAHAEQLANM	600
601	RIQDLKVS	PLHSVNNPIL	RKRKLLG	KDSVYIHDHE	NGAEDSNVAL	EKLRDVIAQC	660
661	ILPQAGKGEN	EDEKLNEVMQ	EAWKYNRECK	LLRDTLQSF	WNGRGFTDKV	DRLKLAEIVK	720
721	QVIEEQTTSH	ESQ					780

1-218: GST Red: HIS6-tag Pink: Thrombin blue: MAPKAPK5

MAPKAPK5 wt ¹ amino acid sequence							
1	MSEESDMDKA	IKETSILEEY	SINWTQKLG	GISGPVRVCV	KKSTQERFAL	KILLDRPKAR	60
61	NEVRLHMMCA	THPNIVQIIE	VFANSVQFP	ESSPRARLLI	VMEMMEGGEL	FHRISQHRHF	120
121	TEKQASQVTK	QIALALRHCH	LLNIAHRDLK	PENLLFKDNS	LDAPVKLCDF	GFAKIDQGD	180
181	MTPQFTPYV	APQVLEAQR	HQKEKSGIIP	TSPTPYTYNK	SCDLWSLGI	IYVMLCGYP	240
241	FYSKHSRTI	PKDMRRKIMT	GSFEFPEE	SQISEMAKDV	VRKLLKVKPE	ERLTIEGVLD	300
301	HPWLNSTEAL	DNVLPQAQLM	MDKAVVAGIQ	QAHAEQLANM	RIQDLKVS	PLHSVNNPIL	360
361	RKRKLLG	KDSVYIHDHE	NGAEDSNVAL	EKLRDVIAQC	ILPQAGKGEN	EDEKLNEVMQ	420
421	EAWKYNRECK	LLRDTLQSF	WNGRGFTDKV	DRLKLAEIVK	QVIEEQTTSH	ESQ	480

blue: MAPKAPK5 sequence expressed in fusionprotein

¹NCBI/Protein accession number NP_620777.1

Recombinant Proteins