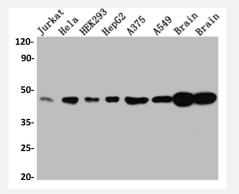


#### RecomAb™

# MAPK1 recombinant monoclonal antibody, clone 10C7

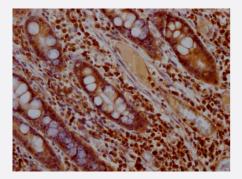
Catalog # RAB07408 Size 100 uL

## **Applications**



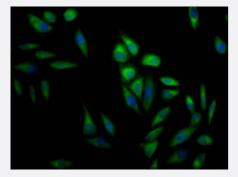
#### Western Blot

Western blot analysis of Jurkat whole cell lysate, Hela whole cell lysate, HEK293 whole cell lysate, HepG2 whole cell lysate, A375 whole cell lysate, A549 whole cell lysate, Rat Brain whole cell lysate, Mouse Brain whole cell lysate with MAPK1 recombinant monoclonal antibody, clone 10C7 (Cat # RAB07408).



### Immunohistochemistry (Formalin/PFA-fixed paraffinembedded sections)

Immunohistochemical analysis of paraffin-embedded human colon cancer using MAPK1 recombinant monoclonal antibody, clone 10C7 (Cat # RAB07408) on a Leica BondTM system. After dewaxing and hydration, antigen retrieval was mediated by high pressure in a citrate buffer (pH 6.0). Section was blocked with 10% normal goat serum 30min at RT. Then primary antibody (1% BSA) was incubated at 4°C overnight. The primary is detected by a Goat anti-rabbit IgG polymer labeled by HRP and visualized using 0.05% DAB.



#### Immunofluorescence

Immunofluorescent staining of Hela Cells with MAPK1 recombinant monoclonal antibody, clone 10C7 (Cat # RAB07408). The cells were fixed in 4% formaldehyde, permeated by 0.2% TritonX-100, and blocked in 10% normal Goat Serum. The cells were then incubated with the antibody overnight at 4°C. Nuclear DNA was labeled in blue with DAPI. The secondary antibody was FITC-conjugated AffiniPure Goat Anti-Rabbit IgG (H+L).

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# **Product Information**

## Specification

Product Description	Rabbit recombinant monoclonal antibody raised against human MAPK1.
Antibody Species	Rabbit
Immunogen	Original antibody is raised against a synthetic peptide corresponding to human MAPK1.
Theoretical MW (kDa)	Calculated MW: 42, 3
Reactivity	Human, Mouse, Rat
Form	Liquid
Purification	Affinity chromatography purification
lsotype	lgG
Recommend Usage	ELISA Immunofluorescence (1:20-1:200) Immunohistochemistry (1:50-1:200) Western Blot (1:500-1:5000) The optimal working dilution should be determined by the end user.
Storage Buffer	In PBS, pH7.4 (150 mM NaCl, 0.02% sodium azide and 50% glycerol)
Storage Instruction	Store at -20°C or -80°C. Aliquot to avoid repeated freezing and thawing.
Note	This product contains sodium azide: a POISONOUS AND HAZARDOUS SUBSTANCE which shoul d be handled by trained staff only.

### Applications

#### Western Blot

Western blot analysis of Jurkat whole cell lysate, Hela whole cell lysate, HEK293 whole cell lysate, HepG2 whole cell lysate, A375 whole cell lysate, A549 whole cell lysate, Rat Brain whole cell lysate, Mouse Brain whole cell lysate with MAPK1 recombinant monoclonal antibody, clone 10C7 (Cat # RAB07408).

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Enzyme-linked Immunoabsorbent Assay

## Gene Info — MAPK1

Entrez GenelD	<u>5594</u>
Protein Accession#	<u>P28482</u>
Gene Name	MAPK1
Gene Alias	ERK, ERK2, ERT1, MAPK2, P42MAPK, PRKM1, PRKM2, p38, p40, p41, p41mapk
Gene Description	mitogen-activated protein kinase 1
Omim ID	<u>176948</u>
Gene Ontology	Hyperlink
Gene Summary	The protein encoded by this gene is a member of the MAP kinase family. MAP kinases, also kno wn as extracellular signal-regulated kinases (ERKs), act as an integration point for multiple bioche mical signals, and are involved in a wide variety of cellular processes such as proliferation, differe ntiation, transcription regulation and development. The activation of this kinase requires its phosp horylation by upstream kinases. Upon activation, this kinase translocates to the nucleus of the sti mulated cells, where it phosphorylates nuclear targets. Two alternatively spliced transcript variants encoding the same protein, but differing in the UTRs, have been reported for this gene. [provided by RefSeq
Other Designations	OTTHUMP00000174492 extracellular signal-regulated kinase 2 extracellular signal-regulated kin ase-2 mitogen-activated protein kinase 2 protein tyrosine kinase ERK2

## Pathway

- Acute myeloid leukemia
- <u>Adherens junction</u>
- <u>Axon guidance</u>
- <u>B cell receptor signaling pathway</u>

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- Bladder cancer
- <u>Chemokine signaling pathway</u>
- Chronic myeloid leukemia
- Colorectal cancer
- Dorso-ventral axis formation
- Endometrial cancer
- ErbB signaling pathway
- Fc epsilon RI signaling pathway
- Fc gamma R-mediated phagocytosis
- Focal adhesion
- Gap junction
- Glioma
- GnRH signaling pathway
- Insulin signaling pathway
- Long-term depression
- Long-term potentiation
- MAPK signaling pathway
- Melanogenesis
- Melanoma
- mTOR signaling pathway
- Natural killer cell mediated cytotoxicity
- <u>Neurotrophin signaling pathway</u>
- Non-small cell lung cancer
- Pancreatic cancer
- Pathways in cancer
- Prion diseases

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- Prostate cancer
- <u>Regulation of actin cytoskeleton</u>
- <u>Renal cell carcinoma</u>
- <u>T cell receptor signaling pathway</u>
- TGF-beta signaling pathway
- Thyroid cancer
- Toll-like receptor signaling pathway
- <u>Type II diabetes mellitus</u>
- <u>Vascular smooth muscle contraction</u>
- VEGF signaling pathway

### Disease

- <u>Anorexia Nervosa</u>
- <u>Asthma</u>
- <u>Bulimia</u>
- <u>Cardiovascular Diseases</u>
- Diabetes Mellitus
- Disease Models
- <u>Edema</u>
- Genetic Predisposition to Disease
- HIV Infections
- Kidney Failure
- Narcolepsy
- Ovarian Neoplasms
- <u>Thyroid Neoplasms</u>