

## Product datasheet for **TA392536**

### Rabbit Polyclonal Antibody

#### Product data:

Product Type:	Primary Antibodies
Applications:	IF, IHC, WB
Recommended Dilution:	WB: 1:5000~1:10000 IHC: 1:50~1:200 IF: 1:50~1:200
Reactivity:	Human, Rat, Mouse
Host:	Rabbit
Isotype:	IgG
Clonality:	Polyclonal
Immunogen:	Synthetic phosphopeptide derived from human ERK1/2 around the phosphorylation site of Threonine 202 / Tyrosine 204.
Specificity:	ERK1/2 (Phospho-T202/Y204) polyclonal antibody detects endogenous levels of ERK1/2 protein only when phosphorylated at Thr202/Tyr204.
Formulation:	Rabbit IgG, 1mg/ml in PBS with 0.02% sodium azide, 50% glycerol, pH7.2.
Concentration:	1mg/ml
Conjugation:	Unconjugated
Storage:	Store at 4°C short term. Aliquot and store at -20°C long term. Avoid freeze-thaw cycles.
Stability:	1 year
Predicted Protein Size:	~ 42,44 kDa
Database Link:	<a href="#">P27361/P28482</a>



[View online »](#)

**Background:**

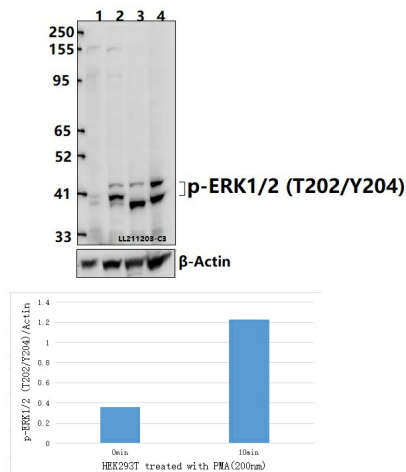
Mitogen-activated protein kinases (MAPKs) are a widely conserved family of serine/threonine protein kinases involved in many cellular programs, such as cell proliferation, differentiation, motility, and death. The p44/42 MAPK (Erk1/2) signaling pathway can be activated in response to a diverse range of extracellular stimuli including mitogens, growth factors, and cytokines, and research investigators consider it an important target in the diagnosis and treatment of cancer. Upon stimulation, a sequential three-part protein kinase cascade is initiated, consisting of a MAP kinase kinase kinase (MAPKKK or MAP3K), a MAP kinase kinase (MAPKK or MAP2K), and a MAP kinase (MAPK). Multiple p44/42 MAP3Ks have been identified, including members of the Raf family, as well as Mos and Tpl2/COT. MEK1 and MEK2 are the primary MAPKKs in this pathway. MEK1 and MEK2 activate p44 and p42 through phosphorylation of activation loop residues Thr202/Tyr204 and Thr185/Tyr187, respectively. Several downstream targets of p44/42 have been identified, including p90RSK and the transcription factor Elk-1. p44/42 are negatively regulated by a family of dual-specificity (Thr/Tyr) MAPK phosphatases, known as DUSPs or MKPs, along with MEK inhibitors, such as U0126 and PD98059.

**Synonyms:**

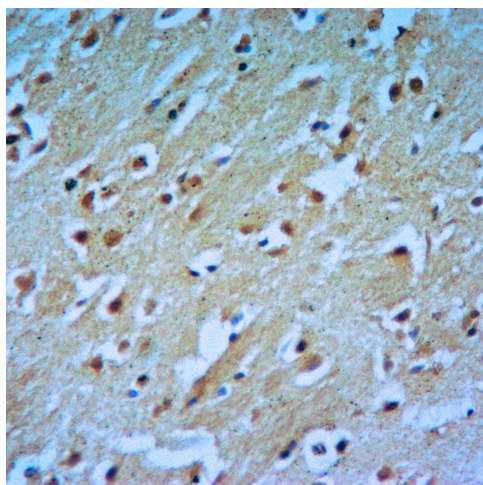
ERK-2; ERK2, PRKM1, PRKM2; ERT1; Extracellular signal-regulated kinase 2; MAPK 1; MAPK1; MAPK 2; MAP kinase 1; MAP kinase 2; MAP kinase isoform p42; Mitogen-activated protein kinase 1; Mitogen-activated protein kinase 2; p42-MAPK

**Note:**

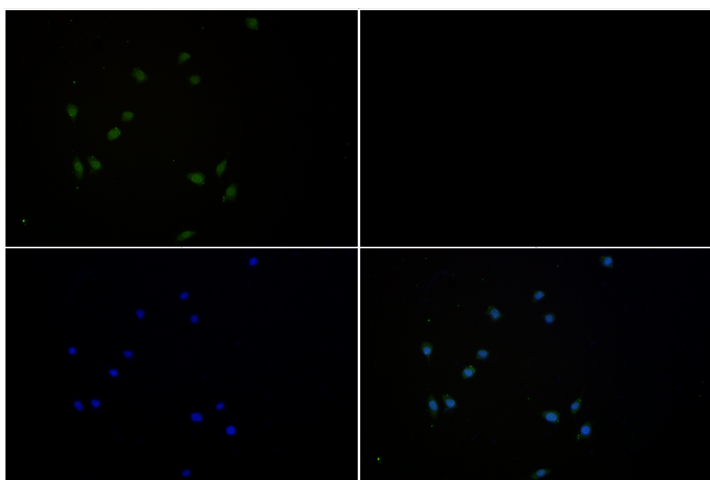
For research use only, not for use in diagnostic procedure.

**Product images:**


Western blot (WB) analysis of ERK1/2 (Phospho-T202/Y204) polyclonal antibody at 1:5000 dilution  
 Lane1:HEK293T whole cell lysate(40ug)  
 Lane2:HEK293T treated with PMA(200nM, 10 min) whole cell lysate(40ug) Lane3:BV2 whole cell lysate(40ug) Lane4:C6 whole cell lysate(40ug)



Immunohistochemistry of paraffin-embedded Rat Brain using ERK1/2 (Phospho-T202/Y204) antibody at dilution of 1:50.



Immunofluorescence analysis of BV2 cells using ERK1/2 (Phospho-T202/Y204) antibody at dilution of 1:50.