ELK Biotechnology

BMAL1 (phospho-Ser42) rabbit pAb

Cat No.:ES17975

For research use only

Overview

Product Name	BMAL1 (phospho-Ser42) rabbit pAb
Host species	Rabbit
Applications	WB
Species Cross-Reactivity	Human;Mouse;Rat
Recommended dilutions	WB 1:1000-2000
Immunogen	Synthesized phosho peptide around human BMAL1 (Ser42)
Specificity	This antibody detects endogenous levels of Human Mouse Rat BMAL1 (phospho-Ser42)
Formulation	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.
Storage	Store at -20℃. Avoid repeated freeze-thaw cycles.
Protein Name	BMAL1 (Ser42)
Gene Name	ARNTL BHLHE5 BMAL1 MOP3 PASD3
Cellular localization	Nucleus . Cytoplasm . Nucleus, PML body . Shuttles between the nucleus and the cytoplasm and this nucleocytoplasmic shuttling is essential for the nuclear accumulation of CLOCK, target gene transcription and the degradation of the CLOCK-ARNTL/BMAL1 heterodimer. The sumoylated form localizes in the PML body. Sequestered to the cytoplasm in the presence of ID2. .
Purification	The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen.
Clonality	Polyclonal
Concentration	1 mg/ml
Observed band	69kD
Human Gene ID	406
Human Swiss-Prot Number	O00327
Alternative Names	Aryl hydrocarbon receptor nuclear translocator-like protein 1 (Basic-helix-loop-helix-PAS protein MOP3) (Brain and muscle ARNT-like 1) (Class E basic

helix-loop-helix protein 5) (bHLHe5) (Member of PAS protein 3) (PAS domain-containing protein 3) (bHLH-PA

Background

The protein encoded by this gene is a basic helix-loop-helix protein that forms a heterodimer with CLOCK. This heterodimer binds E-box enhancer elements upstream of Period (PER1, PER2, PER3) and Cryptochrome (CRY1, CRY2) genes and activates transcription of these genes. PER and CRY proteins heterodimerize and repress their own transcription by interacting in a feedback loop with CLOCK/ARNTL complexes. Defects in this gene have been linked to infertility, problems with gluconeogenesis and lipogenesis, and altered sleep patterns. Several transcript variants encoding different isoforms have been found for this gene. [provided by RefSeq, Jul 2014],