

UCK Antibody (N-term) Blocking Peptide
Synthetic peptide
Catalog # BP8129a**Specification**

UCK Antibody (N-term) Blocking Peptide - Product InformationPrimary Accession [P30085](#)**UCK Antibody (N-term) Blocking Peptide - Additional Information****Gene ID** 51727**Other Names**

UMP-CMP kinase {ECO:0000255|HAMAP-Rule:MF_03172}, 27414 {ECO:0000255|HAMAP-Rule:MF_03172}, Deoxycytidylate kinase {ECO:0000255|HAMAP-Rule:MF_03172}, CK {ECO:0000255|HAMAP-Rule:MF_03172}, dCMP kinase {ECO:0000255|HAMAP-Rule:MF_03172}, Nucleoside-diphosphate kinase {ECO:0000255|HAMAP-Rule:MF_03172}, 2746 {ECO:0000255|HAMAP-Rule:MF_03172}, Uridine monophosphate/cytidine monophosphate kinase {ECO:0000255|HAMAP-Rule:MF_03172}, UMP/CMP kinase {ECO:0000255|HAMAP-Rule:MF_03172}, UMP/CMPK {ECO:0000255|HAMAP-Rule:MF_03172}, CMPK1 {ECO:0000255|HAMAP-Rule:MF_03172}

Target/Specificity

The synthetic peptide sequence used to generate the antibody [AP8129a](/product/products/AP8129a) was selected from the N-term region of human UCK. A 10 to 100 fold molar excess to antibody is recommended. Precise conditions should be optimized for a particular assay.

Format

Peptides are lyophilized in a solid powder format. Peptides can be reconstituted in solution using the appropriate buffer as needed.

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C.

Precautions

This product is for research use only. Not for use in diagnostic or therapeutic procedures.

UCK Antibody (N-term) Blocking Peptide - Protein Information**Name** CMPK1 {ECO:0000255|HAMAP-Rule:MF_03172}**Function**

Catalyzes the phosphorylation of pyrimidine nucleoside monophosphates at the expense of ATP. Plays an important role in de novo pyrimidine nucleotide biosynthesis. Has preference for UMP and CMP as phosphate acceptors. Also displays broad nucleoside diphosphate kinase activity.

Cellular Location

Nucleus {ECO:0000255|HAMAP-Rule:MF_03172, ECO:0000269|PubMed:10462544, ECO:0000269|PubMed:11912132}. Cytoplasm {ECO:0000255|HAMAP-Rule:MF_03172, ECO:0000269|PubMed:10462544, ECO:0000269|PubMed:11912132}. Note=Predominantly cytoplasmic, less than 15% nuclear.

Tissue Location

Ubiquitously expressed.

UCK Antibody (N-term) Blocking Peptide - Protocols

Provided below are standard protocols that you may find useful for product applications.

- [Blocking Peptides](#)

UCK Antibody (N-term) Blocking Peptide - Images**UCK Antibody (N-term) Blocking Peptide - Background**

UCK1 (Uridine-cytidine kinase 1) phosphorylates uridine and cytidine to uridine monophosphate and cytidine monophosphate. This enzyme does not phosphorylate deoxyribonucleosides or purine ribonucleosides. Of note, UCK1 is able to use either ATP or GTP as a phosphate donor. UCK1 also possesses the ability to phosphorylate a number of cytidine and uridine nucleoside analogs such as 6-azauridine, 5-fluorouridine, 4-thiouridine, 5-bromouridine, N(4)-acetylcytidine, N(4)-benzoylcytidine, 5-fluorocytidine, 2-thiocytidine, 5-methylcytidine, and N(4)-anisoylcytidine.

UCK Antibody (N-term) Blocking Peptide - References

Strausberg, R.L., et al., Proc. Natl. Acad. Sci. U.S.A. 99(26):16899-16903 (2002).Hu, R.M., et al., Proc. Natl. Acad. Sci. U.S.A. 97(17):9543-9548 (2000).Hughes, G.J., et al., Electrophoresis 14(11):1216-1222 (1993).Hochstrasser, D.F., et al., Electrophoresis 13(12):992-1001 (1992).