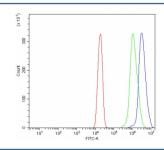


# **ORC1 Antibody / Origin Recognition Complex 1 (RQ7986)**

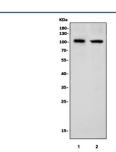
Catalog No.	Formulation	Size
RQ7986	0.5mg/ml if reconstituted with 0.2ml sterile DI water	100 ug

# **Bulk quote request**

Availability	1-3 business days
Species Reactivity	Human
Format	Antigen affinity purified
Clonality	Polyclonal (rabbit origin)
Isotype	Rabbit IgG
Purity	Antigen affinity purified
Buffer	Lyophilized from 1X PBS with 2% Trehalose
UniProt	Q13415
Applications	Western Blot : 0.5-1ug/ml Flow Cytometry : 1-3ug/million cells Direct ELISA : 0.1-0.5ug/ml
Limitations	This ORC1 antibody is available for research use only.



Flow cytometry testing of human U-2 OS cells with ORC1 antibody at 1ug/million cells (blocked with goat sera); Red=cells alone, Green=isotype control, Blue= ORC1 antibody.



Western blot testing of human 1) HL-60 and 2) K562 cell lysate with ORC1 antibody. Predicted molecular weight ~97 kDa.

## **Description**

Origin recognition complex subunit 1 is a protein that in humans is encoded by the ORC1 gene. The origin recognition complex (ORC) is a highly conserved six subunits protein complex essential for the initiation of the DNA replication in eukaryotic cells. Studies in yeast demonstrated that ORC binds specifically to origins of replication and serves as a platform for the assembly of additional initiation factors such as Cdc6 and Mcm proteins. The protein encoded by this gene is the largest subunit of the ORC complex. While other ORC subunits are stable throughout the cell cycle, the levels of this protein vary during the cell cycle, which has been shown to be controlled by ubiquitin-mediated proteolysis after initiation of DNA replication. This protein is found to be selectively phosphorylated during mitosis. It is also reported to interact with MYST histone acetyltransferase 2 (MyST2/HBO1), a protein involved in control of transcription silencing. Alternatively spliced transcript variants encoding different isoforms have been found for this gene.

## **Application Notes**

Optimal dilution of the ORC1 antibody should be determined by the researcher.

## **Immunogen**

E. coli-derived recombinant human protein (amino acids H628-E861) was used as the immunogen for the ORC1 antibody.

## **Storage**

After reconstitution, the ORC1 antibody can be stored for up to one month at 4oC. For long-term, aliquot and store at -20oC. Avoid repeated freezing and thawing.