

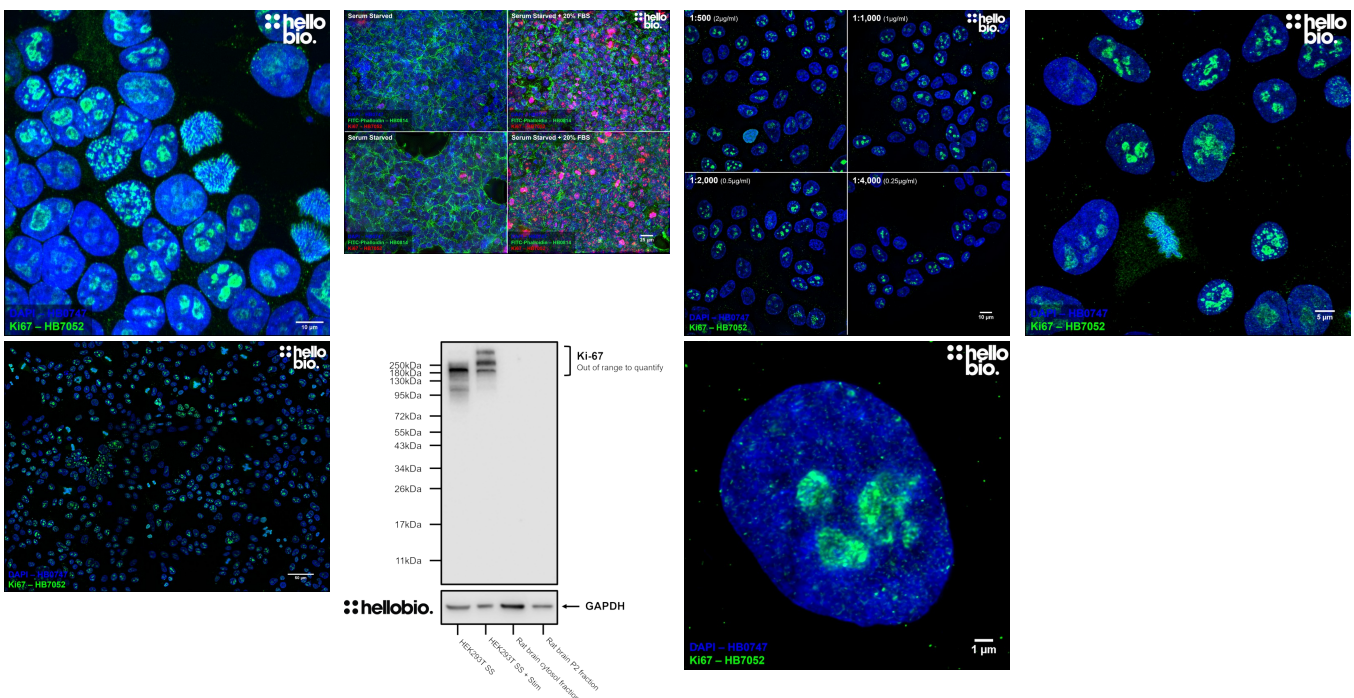
DATASHEET

Anti-Ki-67 antibody ValidAb™

Product overview

Name	Anti-Ki-67 antibody ValidAb™
Cat No	HB7052
Host	Mouse
Clonality	Monoclonal
Target	Ki-67
Description	Antibody to Ki-67 - a widely used marker of proliferating cells. Part of the ValidAb™ range of highly validated, data-rich antibodies.

Validation data



Product information

Immunogen	Nuclei derived from the L428 Hodgkin Lymphoma cell line
Clone number	Ki-67
Isotype	IgG1
Purification	Protein A affinity chromatography
Concentration	1mg/ml
Formulation	Lyophilised. When reconstituted contains PBS with 15mM sodium azide and 1% recombinant albumin
Predicted species reactivity	Human, Cow
Tested species reactivity	Human

Tested applications

Applications	ICC, WB
Western blot optimal concentration	2µg/ml (1:500 dilution) as tested in cultured HEK293T cells.
ICC optimal concentration	0.5µg/ml (1:2,000 dilution) as tested in cultured HEK293T cells.
Positive control	All proliferating cells express Ki-67. An easy positive control is using any standard cell line under normal culturing conditions.
Negative control	Cells in G ₀ do not express Ki-67. An easy negative control is to serum starve cells by growing in serum free media to arrest the cell cycle and inhibit Ki-67 expression.
Open data link	Please follow this link to OSF

Target information

Other names	Proliferation marker protein Ki-67, Antigen identified by monoclonal antibody Ki-67, MKI67
UniProt ID	P46013
Gene name	MKI67
NCBI full gene name	marker of proliferation Ki-67
Entrez gene ID	4288
Amino acids	3,256 (358.7kDa)
Isoforms	Ki-67 has two isoforms produced by differential splicing: <ul style="list-style-type: none">• Long - 3,256 amino acids (358.7kDa)• Short - 2,896 amino acids (319.4kDa) - missing residues 136-495
Expression	Ki-67 is found in all proliferating cells.
Subcellular expression	Ki-67 is expressed in the nucleus where its localisation changes by cell cycle phase but is predominantly found in association with DNA.
Processing	Ki-67 is not subject to any processing to form the active conformation.
Post translational modifications	Ki-67 is subject to phosphorylation on many of its serine, threonine and tyrosine residues alongside forming cross-links with SUMO1 and SUMO2 at multiple residues.
Homology (compared to human)	Mouse and rat Ki-67 show low homology with human Ki-67 with homology scores of 42.7% and 43.4% homology respectively. Due to this low homology HB7052 does not react with mouse and rat Ki-67.
Similar proteins	There are no proteins with significant homology to Ki-67

Storage & Handling

Storage instructions	-20°C
Important	This product is for RESEARCH USE ONLY and is not intended for therapeutic or diagnostic use. Not for human or veterinary use

References

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Menon SS et al (2019) Clinica chimica acta; international journal of clinical chemistry 491
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