

Product Specification Sheet

Survivin (BIRC5; AIP4; EPR1) Antibodies

Cat # SURV14-P	Human Survivin Control/Blocking Peptide	SIZE: 100 ug
Cat # SURV14-A	Rabbit anti-human Survivin IgG (affinity pure)	SIZE: 100 ug

Apoptosis is a form of cell death that permits the removal of damaged, senescent or unwanted cells in multicellular organisms, without damage to the cellular microenvironment.

Survivin is a member of the inhibitor of apoptosis (IAP) gene family, which encodes negative regulatory proteins that prevent apoptotic cell death. repeat (BIR) domains, but this gene encodes proteins with only a single BIR domain. Survivin appears to have an important role in regulating apoptosis at cell cycle checkpoint(s). Survivin expression is highly cell cycle-regulated, and is detectable in the nucleus selectively at the G2/M phase.

Human Survivin: Isoform 1 – 142 aa, 16.4 kDa; Isoform 2 – 165 aa, 18.6 kDa; Isoform 3 – 137 aa, 15.6 kDa; Isoform 4 – 120 aa, 13.8 kDa; Isoform 5 – 117 aa, 13.5 kDa; Isoform 6 – 78 aa, 9 kDa; Isoform 7 – 74 aa, 8.5 kDa. Human chromosome: 17q25. Mainly expressed in fetal kidney and liver, and to lesser extent, lung and brain; abundantly expressed in adenocarcinoma (lung, pancreas, colon, breast, and prostate) and in high-grade lymphomas.

Source of Antigen, Antibodies

Antigen	21- aa (Phospho-Tyr 35) peptide of Human BIRC5 (Protein accession # O15392 ; ref. 1); designated as SURV14-P control/blocking peptide conjugated to KLH
Epitope Location	~N-terminus
Antibody host/type	Rabbit, Polyclonal IgG (Cat # SURV14-A), purified over antigen-Agarose
Secondary Ab	Cat # 20320, goat anti-rabbit IgG-HRP (AP, biotin, FITC conjugates also available).
Negative Control Ab	Non-immune rabbit IgG (Cat # 20009-1) to be used as –ve control for ELISA, WB, IHC etc.

Form & Storage of Antibodies/Peptide Control

Affinity pure IgG

100 ug/100ul solution lyophilized powder
Supplied in **Buffer:** PBS+0.1% BSA
Reconstitute powder in PBS at 1 mg/ml

Control/blocking peptide

100 ug/100 ul solution lyophilized powder
Supplied in Buffer: PBS pH 7.5,
Reconstitute powder in PBS at 1 mg/ml.

Storage

Short-term: unopened, undiluted vials for less than a week at 4oC.

Long-term: at –20°C or below in suitable aliquots after reconstitution. Do not freeze and thaw and store working, diluted solutions.

Stability: 6-12 months at –20°C or below.

Shipping: 4°C for solutions and room temp for powder.

Recommended Usage

Western Blotting: 1-10 µg/ml; using affinity pure antibody (chemiluminescence technique).

ELISA: 1:100K; using 50-100 ng control peptide/well.

Histochemistry & Immunofluorescence: Not tested; we recommend the use of affinity purified antibody at 2-10 µg/ml.

Specificity & Cross-reactivity

Human SURV14-P peptide sequence is conserved in all the isoforms of human survivin. It is 100% identical to chicken, pig and bovine; 92% identical to mouse and 83% identical to rat surviving proteins. Antibody cross-reactivity in various species is not known. The control peptide, because of its low mol. Wt (<3 kDa), is not suitable for Western. It should be used for ELISA or antibody blocking experiments (use 5-10 ug control peptide per 1 ug of aff pure IgG or 1 ul antiserum) to confirm antibody specificity (see detailed protocol at the web site).

General References:

(1) Mahotka C, et al., (1999) Cancer Res. 59:6097-6102.

List of related items, data sheets, and publications, using ADI antibodies is posted on the web site

*This product is for in vitro research use only.

Related material available from ADI

Antibodies to all isoforms of Human Survivin.

SURV14-A-P

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