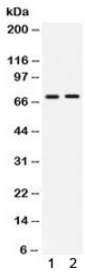
cIAP2 Antibody / Cellular inhibitor of apoptosis 1 / BIRC3 (R32217)

Catalog No.	Formulation	Size
R32217	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
Buffer	Lyophilized from 1X PBS with 2.5% BSA and 0.025% sodium azide
UniProt	Q13489
Applications	Western Blot : 0.1-0.5ug/ml
Limitations	This cIAP2 antibody is available for research use only.



Western blot testing of human 1) HepG2 and 2) HeLa lysate with cIAP2 antibody. Predicted/observed molecular weight ~68 kDa.

Description

cIAP2 antibody targets cellular inhibitor of apoptosis 2 (cIAP2), encoded by the BIRC3 gene, a member of the inhibitor of apoptosis protein family involved in regulating cell death and inflammatory signaling. cIAP2 is a cytoplasmic protein containing multiple baculoviral IAP repeat domains and a C-terminal RING finger domain, which together enable protein-protein interactions and ubiquitin ligase activity. Unlike direct caspase inhibitors, cIAP2 primarily functions as a signaling regulator that shapes downstream responses to cytokines and stress signals. Its expression is inducible and often linked to inflammatory and immune signaling pathways.

Functionally, cIAP2 plays an important role in tumor necrosis factor receptor and innate immune signaling. By catalyzing

ubiquitination of key adaptor proteins, cIAP2 promotes activation of NF-kappaB and MAPK pathways that favor cell survival and inflammatory gene expression. Through this activity, cIAP2 helps suppress apoptosis and necroptosis under conditions where survival signaling is required. A cIAP2 antibody supports studies investigating how ubiquitin-dependent signaling controls cell fate and immune responses.

cIAP2 localization is predominantly cytoplasmic, where it associates with receptor-proximal signaling complexes. Its abundance and activity are tightly regulated at both transcriptional and post-translational levels, allowing cells to rapidly adjust survival signaling in response to environmental cues. cIAP2 is often upregulated following cytokine stimulation, infection, or cellular stress, reflecting its role in adaptive survival mechanisms. Analysis of cIAP2 expression provides insight into how cells coordinate inflammatory signaling with protection against inappropriate cell death.

From a biological and disease-relevance perspective, cIAP2 has been extensively studied in the context of cancer, chronic inflammation, and immune dysregulation. Aberrant expression or stabilization of cIAP2 has been reported in certain malignancies, where it can contribute to resistance to apoptosis and altered immune signaling. cIAP2 is also implicated in disorders involving prolonged inflammatory signaling, highlighting its importance in balancing immune activation and tissue homeostasis. Understanding cIAP2 regulation is therefore relevant to studies of tumor biology, immune signaling, and therapeutic resistance mechanisms.

At the molecular level, cIAP2 is encoded by the BIRC3 gene and produces a protein with an apparent molecular weight of approximately 70 kDa. The baculoviral IAP repeat domains mediate interactions with signaling partners, while the RING finger domain confers E3 ubiquitin ligase activity that directs ubiquitin chain assembly. cIAP2 activity depends on its ability to integrate into multiprotein signaling complexes and respond dynamically to upstream signals. A cIAP2 antibody supports research applications focused on apoptosis regulation, ubiquitin signaling, and inflammatory pathway biology, with NSJ Bioreagents providing reagents intended for research use.

Application Notes

Optimal dilution of the cIAP2 antibody should be determined by the researcher.

Immunogen

Amino acids 1-191 of human cIAP2 were used as the immunogen for the cIAP2 antibody.

Storage

After reconstitution, the cIAP2 antibody can be stored for up to one month at 4oC. For long-term, aliquot and store at -20oC. Avoid repeated freezing and thawing.