

Technical Data Sheet

Purified Hamster Anti-Human Bcl-2

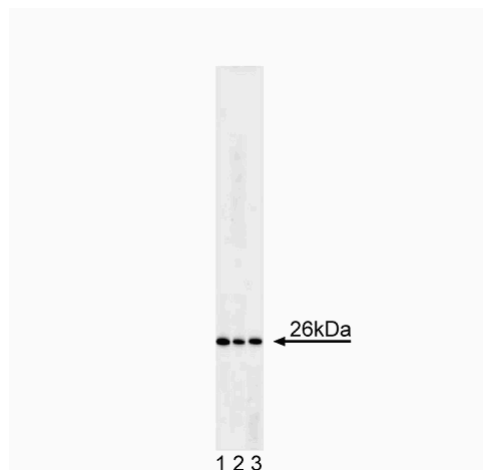
Product Information

Material Number:	551051
Reactivity:	QC Testing: Human
Component:	51-1513GR
Description:	Purified Hamster Anti-Human Bcl-2
Size:	50 µg (1 ea)
Concentration:	0.25 mg/ml
Clone Name:	6C8
Immunogen:	Human Bcl-2 Recombinant Protein
Isotype:	Armenian Hamster IgG2, κ
Target MW:	26 kDa
Storage Buffer:	Aqueous buffered solution containing BSA, glycerol, and ≤0.09% sodium azide.

Component:	51-16526N
Description:	Jurkat Cell Lysate
Size:	50 µg (1 ea)
Concentration:	1.0 mg/ml
Storage Buffer:	SDS-PAGE buffer (62mM Tris pH 6.8, 2% SDS, 0.9% b-mercaptoethanol, 0.003% bromophenol blue, 5% glycerol)

Description

Bcl-2 is considered to be novel among proto-oncogenes because it blocks apoptosis (programmed cell death) in many cell types. Apoptosis is an active form of cellular suicide that typically requires new RNA and protein synthesis and is associated with distinct morphological changes including cell shrinkage, cytoplasm membrane blebbing, nuclear fragmentation and DNA degradation. The Bcl-2 gene was first found in t(14:18) containing follicular B-cell lymphomas. A high proportion of these lymphomas contains t(14:18) chromosomal translocations involving the human Bcl-2 gene. Translocation of Bcl-2 sequences from chromosome 18 onto the transcriptionally active immunoglobulin locus at chromosome band 14q32 in B-cells deregulates Bcl-2 gene expression, resulting in high levels of Bcl-2 mRNA and protein expression. Because Bcl-2 blocks apoptosis it may contribute to tumorigenesis by prolonged cell survival rather than by accelerating the rate of cell proliferation. The reduced molecular weight of Bcl-2 is 26 kDa. Additional minor bands at 27-31 kDa and 18-21 kDa may also be observed.



Western blot analysis of Bcl-2. A Jurkat cell lysate (Human T-cell leukemia; ATCC TIB-152) was probed with the hamster anti-human Bcl-2 antibody at concentrations of 3.0 µg/mL (lane 1), 1.0 µg/mL (lane 2), and 0.5 µg/mL (lane 3). Bcl-2 can be identified as a band of ~ 26 kDa.

Preparation and Storage

The monoclonal antibody was purified from tissue culture supernatant or ascites by affinity chromatography.

Store both the hamster anti-human Bcl-2 antibody (component 51-1513GR) and the Jurkat cell lysate (component 51-16526N) undiluted at -20°C.

BD Biosciences

bdbiosciences.com

United States	Canada	Europe	Japan	Asia Pacific	Latin America/Caribbean
877.232.8995	888.259.0187	32.53.720.550	0120.8555.90	65.6861.0633	55.11.5185.9995

For country-specific contact information, visit bdbiosciences.com/how_to_order/

Conditions: The information disclosed herein is not to be construed as a recommendation to use the above product in violation of any patents. BD Biosciences will not be held responsible for patent infringement or other violations that may occur with the use of our products. Purchase does not include or carry any right to resell or transfer this product either as a stand-alone product or as a component of another product. Any use of this product other than the permitted use without the express written authorization of Becton Dickinson and Company is strictly prohibited.

For Research Use Only. Not for use in diagnostic or therapeutic procedures. Not for resale.

BD, BD Logo and all other trademarks are the property of Becton, Dickinson and Company. ©2008 BD



Application Notes

Application

Western blot	Routinely Tested
Immunofluorescence	Reported
Immunohistochemistry-frozen	Reported
Immunoprecipitation	Reported
Flow cytometry	Reported

Recommended Assay Procedure:

Western blot: Please refer to http://www.bdbiosciences.com/pharmingen/protocols/Western_Blotting.shtml

Suggested Companion Products

Catalog Number	Name	Size	Clone
611451	Jurkat Cell Lysate	500 µg	(none)
554012	Horseradish Peroxidase (HRP) Mouse Anti-Armenian and Syrian Hamster IgG Cocktail	1.0 ml	(none)
554234	FITC Hamster Anti-Human Bcl-2 Set	100 tests	(none)
556536	PE Hamster Anti-Human Bcl-2 Set	100 tests	(none)

Product Notices

1. Since applications vary, each investigator should titrate the reagent to obtain optimal results.
2. Please refer to www.bdbiosciences.com/pharmingen/protocols for technical protocols.
3. Although hamster immunoglobulin isotypes have not been well defined, BD Biosciences Pharmingen has grouped Armenian and Syrian hamster IgG monoclonal antibodies according to their reactivity with a panel of mouse anti-hamster IgG mAbs. A table of the hamster IgG groups, Reactivity of Mouse Anti-Hamster Ig mAbs, may be viewed at http://www.bdbiosciences.com/pharmingen/hamster_chart_11x17.pdf.
4. Caution: Sodium azide yields highly toxic hydrazoic acid under acidic conditions. Dilute azide compounds in running water before discarding to avoid accumulation of potentially explosive deposits in plumbing.
5. Source of all serum proteins is from USDA inspected abattoirs located in the United States.

References

- Batistatou A, Merry DE, Korsmeyer SJ, Greene LA. Bcl-2 affects survival but not neuronal differentiation of PC12 cells. *J Neurosci.* 1993; 13(10):4422-4428. (Biology: Immunofluorescence, Western blot)
- Chiou SK, Rao L, White E. Bcl-2 blocks p53-dependent apoptosis. *Mol Cell Biol.* 1994; 14(4):2556-2563. (Biology: Western blot)
- Hockenbery D, Nuñez G, Milliman C, Schreiber RD, Korsmeyer SJ. Bcl-2 is an inner mitochondrial membrane protein that blocks programmed cell death. *Nature.* 1990; 348(6299):334-336. (Immunogen: Immunofluorescence, Western blot)
- Hockenbery DM, Oltvai ZN, Yin XM, Milliman CL, Korsmeyer SJ. Bcl-2 functions in an antioxidant pathway to prevent apoptosis. *Cell.* 1991; 75(2):241-251. (Biology: Immunofluorescence)
- Hockenbery DM, Zutter M, Hickey W, Nahm M, Korsmeyer SJ. BCL2 protein is topographically restricted in tissues characterized by apoptotic cell death. *Proc Natl Acad Sci U S A.* 1991; 88(16):6961-6965. (Biology: Immunohistochemistry, Immunoprecipitation)
- Martin JM, Veis D, Korsmeyer SJ, Sugden B. Latent membrane protein of Epstein-Barr virus induces cellular phenotypes independently of expression of Bcl-2. *J Virol.* 1993; 67(6):5269-5278. (Biology: Flow cytometry, Western blot)
- McDonnell TJ, Nunez G, Platt FM, et al. Deregulated Bcl-2-immunoglobulin transgene expands a resting but responsive immunoglobulin M and D-expressing B-cell population. *Mol Cell Biol.* 1990; 10(5):1901-1907. (Biology: Western blot)
- Nguyen M, Millar DG, Yong VW, Korsmeyer SJ, Shore GC. Targeting of Bcl-2 to the mitochondrial outer membrane by a COOH-terminal signal anchor sequence. *J Biol Chem.* 1993; 268(34):25265-25268. (Biology: Immunofluorescence, Western blot)
- Núñez G, Merino R, Grillot D, González-García M. Bcl-2 and Bcl-x: regulatory switches for lymphoid death and survival. *Immunity Today.* 1994; 15(12):582-588. (Biology)
- Oltvai ZN, Milliman CL, Korsmeyer SJ. Bcl-2 heterodimerizes in vivo with a conserved homolog, Bax, that accelerates programmed cell death. *Cell.* 1993; 74(4):609-619. (Biology: Immunoprecipitation, Western blot)
- Veis DJ, Sentman CL, Bach EA, Korsmeyer SJ. Expression of the Bcl-2 protein in murine and human thymocytes and in peripheral T lymphocytes. *J Immunol.* 1993; 151(5):2546-2554. (Biology: Flow cytometry, Western blot)
- Yang E, Zha J, Jockel J, Boise LH, Thompson CB, Korsmeyer SJ. Bad, a heterodimeric partner for Bcl-XL and Bcl-2, displaces Bax and promotes cell death. *Cell.* 1995; 80(2):285-291. (Biology: Immunoprecipitation, Western blot)
- Yin XM, Oltvai ZN, Korsmeyer SJ. BH1 and BH2 domains of Bcl-2 are required for inhibition of apoptosis and heterodimerization with Bax. *Nature.* 1994; 369(6478):321-323. (Biology: Immunoprecipitation, Western blot)