

Technical Data Sheet

Purified Mouse Anti-Human Bcl-2

Product Information

Material Number:	551097
Size:	50 µg
Reactivity:	QC Testing: Human
Component:	51-1483GR
Description:	Purified Mouse Anti-Human Bcl-2
Size:	50 µg (1 ea)
Concentration:	0.25 mg/ml
Clone Name:	4D7
Immunogen:	Human Bcl-2 aa. 61-76
Isotype:	Mouse IgG1
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

The *bcl-2* gene was first discovered in t(14;18) follicular lymphomas. 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. Bcl-2 protein blocks apoptosis (programmed cell death), and thereby may contribute to tumorigenesis by prolonging cell survival rather than by accelerating the rate of cell proliferation. Abundant evidence implicates this protein in the suppression of apoptosis in many types of cells. Bcl-2 is an intracellular membrane protein and resides primarily in the nuclear envelope, outer mitochondrial membrane and endoplasmic reticulum. The reduced molecular weight of Bcl-2 is 26 kDa.

Clone 4D7 recognizes human Bcl-2. A synthetic peptide containing amino acids 61-76 of the human Bcl-2 protein was used as immunogen. This peptide sequence differs from that of mouse Bcl-2 and hence 4D7 does not cross-react with mouse. 4D7 recognizes Bcl-2 as a 26 kDa band; however, additional higher molecular weight bands have been observed in some cell types. These bands may represent oligomers of Bcl-2, which have been reported to occur with members of the Bcl-2 family during the preparation of nonionic detergent extracts.



Western blot analysis of *bcl-2*. Lysate from Jurkat cells was probed with anti-*bcl-2* (clone 4D7, Comp. No. 51-1483GR) at concentrations of 1.0 (lane 1), 0.5 (lane 2), and 0.25 µg/ml (lane 3). Bcl-2 is identified as a band of 26 kDa.

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Preparation and Storage

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

Store undiluted at -20°C.

Application Notes

Application

Western blot	Routinely Tested
Immunoprecipitation	Reported
Electron microscopy	Reported

Recommended Assay Procedure:

For immunohistochemistry of paraffin-embedded sections, the monoclonal mouse anti-human Bcl-2 (clone Bcl-2/100, Cat. No. 551109) or clone 7/Bcl-2, (Cat. No. 610539) is recommended. Jurkat control lysate [50 µg (1 µg/µl)] is provided as a western blot positive control (Comp. No. 51-16526N; store lysate at -20°C). Additional control lysate (Cat. No. 611451) is sold separately.

Suggested Companion Products

Catalog Number	Name	Size	Clone
611451	Jurkat Cell Lysate	500 µg	(none)

Product Notices

1. Since applications vary, each investigator should titrate the reagent to obtain optimal results.
2. Please refer to www.bdbiosciences.com/pharming/en/protocols for technical protocols.
3. 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.
4. Source of all serum proteins is from USDA inspected abattoirs located in the United States.

References

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