



Qty: 100 µg/200 µl
Mouse anti-Bcl-2
Catalog No. 13-8800
Lot No.

Mouse anti-Bcl-2

FORM

This monoclonal antibody is highly purified from mouse ascites by Protein A-affinity chromatography and is supplied as a 200 µl aliquot at a concentration of 0.5 mg/ml in PBS (pH 7.4) containing 0.1% NaN₃.

CLONE: Bcl-2-100 **ISOTYPE:** IgG₁-Kappa

IMMUNOGEN

Synthetic peptide corresponding to residues 41-54 of the human Bcl-2 protein^(2,3). This sequence is not shared by the mouse Bcl-2 protein.

SPECIFICITY

This antibody reacts specifically with the human Bcl-2 protein and does not exhibit cross-reactivity with other proteins.

REACTIVITY

The Bcl-2 protein has been detected in human Jurkat cell lysate, human K562 cell lysate, human tonsil tissue (histo).

USAGE

The dilutions given below are good starting points; however, optimal dilution of the antibody should be determined by the investigator for each application. Suitable for ELISA, Flow Cytometry, IP, Western Blotting and Immunohistochemistry^(1,2,3) (frozen and paraffin embedded).

Western Blotting^(2,7): 1 µg/ml
Immunoprecipitation: 2-5 µg
Immunohistochemistry: 5-10 µg/ml (this antibody is available pre-diluted for Histology)
Immunofluorescence⁽⁷⁾
Immunohistostaining⁽²⁾

STORAGE

This antibody can be stored at 2-8°C for at least one month. For long term storage, -20°C is recommended; however, repeated freezing and thawing cycles should be avoided.

BACKGROUND⁽¹⁻⁶⁾

Bcl-2 is a widely studied modulator of programmed cell death (apoptosis) in lymphoid cells. This 26 kD integral membrane protein has been localized to several distinct subcellular locations including: the outer mitochondrial membrane, perinuclear membrane and the smooth endoplasmic reticulum. Overexpression of the Bcl-2 protein has been shown to prevent or delay many forms of programmed cell death induced by a variety of different stimuli including: growth factor deprivation, g-irradiation, glucocorticoids, and chemotherapeutic agents. The *bcl-2* proto-oncogene was first identified at the breakpoint region of the t(14;18) chromosomal translocation found in a large percentage (85%) of human follicular B-cell lymphomas. This translocation results in transcriptional dysregulation of the *bcl-2* gene and overexpression of the Bcl-2 protein. Originally, expression of the Bcl-2 protein was thought to be restricted to neoplastic cells in which the t(14;18) chromosomal translocation was present. However, subsequent studies demonstrated that Bcl-2 is in fact expressed in both normal T- and B-cells, as well as in a variety of lymphoproliferative disorders in which the t(14;18) translocation is not present. Interestingly, expression of the Bcl-2 protein has been found to be regulated in a stage-specific manner during lymphoid development and is thought to be a survival signal for positive selection. However, the precise mechanism whereby Bcl-2 acts to inhibit programmed cell death remains to be elucidated.

(cont'd)

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REFERENCES

1. Nunez, G., Merino, R., Grillot, D., and Garcia-Gonzalez, M.; *Immunol. Today* 15 (12):582-588 (1994).
2. Pezzella, F., Tse, A.G.D., Cordell, J.L., Pulford, K.A.F., Gatter, K.C., and Mason, D.Y.; *Am. J. Pathol.* 137:225-232 (1990).
3. Pezzella, F., Morrison, H., Jones, M., Gatter, K.C., Lane, D., Harris, A.L., and Mason, D.Y.; *Histopathol.* 22:39-44(1993).
4. Pezzella, F., Turley, H., Kuzu, I., Tungekar, M.F., Dunhill, M.S., Pierce, C.B., Harris, A., Gatter, K.C., and Mason, D.Y.; *N. Engl. J. Med.* 329:690-694 (1993).
5. Navratil, E., Gaulard, P., Kanavaros, P., Audouin, J., Bougara, A., Martin, N., Diebold, J., and Mason, D.Y.; *J. Clin. Pathol.* 48: 18-21 (1995).
6. Tsujimoto, Y., and Croce, C.M.; *Proc. Natl. Acad. Sci USA* 83:5214-5218 (1986).
7. Schandl, C.A., et al; *J. Histochem. Cytochem.* 47(2):139-149 (1999).

RELATED PRODUCTS

Product	Clone/PAD	Cat. No.
Mouse anti-p53	BP53.12	13-2200
Mouse anti-p53	PAb240	13-4100
Mouse anti-p53	PAb1801	13-4000
Rabbit anti-p61	polyclonal	71-3300
Mouse anti-RB gene product	Rb1	13-4200
Mouse anti-RB gene product	Mab1	28-0007

Product	Conjugate	Cat. No.
Goat anti-Mouse IgG (H+L) (ZyMAX™ Grade)	Purified	81-6500
	FITC	81-6511
	TRITC	81-6514
	Cy™3	81-6515
	Cy™5	81-6516
	HRP	81-6520
	AP	81-6522
	Biotin	81-6540

Protein A	Sepharose® 4B	10-1041
rec-Protein G	Sepharose® 4B	10-1241

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