

Code No. 11100

**Anti-Human
Galectin-3 (38B2) Mouse IgG MoAb**Volume : 100 µg

Introduction : Galectin is widely distributed in nematodes, insects, and porifers, as well as vertebrates, and it has also been found to be present in true fungi. Galectin does not just occur in the cytoplasm, it is also present in the nucleus, on the cell surface, in the extracellular matrix, etc., and it is thought to be involved in many biological phenomena, including development, differentiation, morphogenesis, tumor metastasis, cell death, and RNA splicing. Galectin-3 is a β -galactoside-binding protein that has been named IgE-binding protein, CBP35, CBP30, Mac-2, L-29, L-31, L34, etc., and structurally it is a chimera-type lectin composed of a sugar-chain-binding domain (galectin domain) and a non-lectin domain. Its biological function is still uncertain, but many studies that should elucidate its function have been performed, and as a result participation of galectin-3 has been demonstrated in the biological phenomena of cell growth, adhesion, metastasis, and apoptosis. For example, a positive correlation has been shown between galectin-3 expression and the degree of malignant transformation in certain types of cell lines. A positive correlation has also recently been shown between galectin-3 expression and degree of malignancy in certain types of malignant tumors, and measurement of galectin-3 is expected to possibly serve as an index of degree of tumor malignancy.

Antigen : Recombinant Galectin-3 protein

Source : Mouse-Mouse hybridoma
(X63 - Ag 8.653 \times BALB/c mouse spleen cells)

Clone : 38B2 **Subclass** : IgG₁

Purification : Affinity purified with protein A

Form : Lyophilized product from PBS containing 1 % BSA and 0.05 % NaN₃.

How to use : 1.0 mL deionized water will be added to the product, then its concentration comes to 100 µg/mL

Stability : Lyophilized product, 5 years at 2 - 8 °C
: Solution, 2 years at -20 °C

Application : This antibody can be used for Immunohistochemistry in concentration of about 2-5 µg/mL by several Immunohistochemical techniques such as Avidin Biotin Complex (ABC) method, however, the dilution rate should be optimized by each laboratories.
: This antibody can be used for western blotting in concentration of about 2 - 5 µg /mL.

Reference : 1. Ochieng J, Platt D, Tait L, Hogan V, Raz T, Carmi P, Raz A. Structure-function relationship of a recombinant human galactoside-binding protein. *Biochemistry*. 1993 Apr 27;32(16):4455-60.
2. van den Brule F, Califice S, Castronovo V. Expression of galectins in cancer: a critical review. *Glycoconj J*. 2004;19(7-9):537-42.
3. Takenaka Y, Fukumori T, Raz A. Galectin-3 and metastasis. *Glycoconj J*. 2004;19(7-9):543-9.
4. Yang RY, Liu FT. Galectins in cell growth and apoptosis. *Cell Mol Life Sci*. 2003 Feb;60(2):267-76.
5. Liu FT, Patterson RJ, Wang JL. Intracellular functions of galectins. *Biochim Biophys Acta*. 2002 Sep 19;1572(2-3):263-73.

For research use only, not for use in diagnostic procedures.