
ALK (translocation specific) (Clone 1A4) Mouse Monoclonal Antibody

Specificity: Human. Others-not tested

Immunogen: Human recombinant protein fragment corresponding to amino acids 1300-1620 of human ALK produced in E.coli

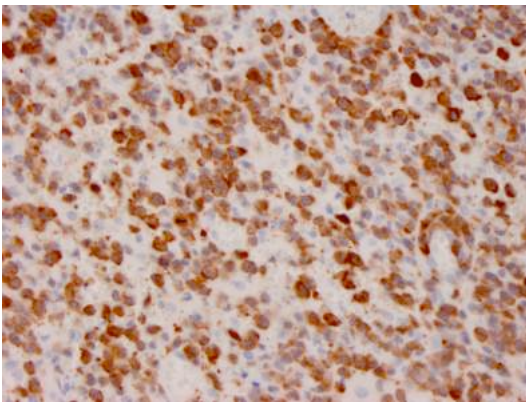
Ig Class: IgG_{2b}

Storage: Store vial at 4°C. When stored at 2-8°C, this antibody is stable for 24 months

Staining procedures: Use formalin-fixed and paraffin-embedded sections. *Retrieval conditions:* For formalin-fixed tissues, optimal results are obtained by pretreating tissues with heat-induced epitope retrieval using high pH target retrieval solution. *Detection methods:* Polymer anti-mouse/rabbit IgG detection system. *Working dilution:* 1:30-50; *Positive Control:* Lung adenocarcinoma with ALK translocation. *Cellular Localization:* Cytoplasmic. *Intended Use:* In vitro diagnosis (IVD).

Description: The ALK gene encodes a receptor tyrosine kinase, which belongs to the insulin receptor superfamily. It plays an important role in the development of the brain and exerts its effects on specific neurons in the nervous system. This gene has been found to be rearranged, mutated, or amplified in a series of tumors including anaplastic large cell lymphomas, neuroblastoma, and non-small cell lung cancer. The chromosomal rearrangements are the most common genetic alterations in this gene, which result in creation of multiple fusion genes in tumorigenesis, including *ALK/EML4*, *ALK/RANBP2*, *ALK/ATIC*, *ALK/TFG*, *ALK/NPM1*, *ALK/SQSTM1*, *ALK/KIF5B*, *ALK/CLTC*, *ALK/TPM4*, and *ALK/MSN*. The specificity of the anti-human ALK antibody (clone 1A4) was established on known ALK positive and negative non-small cell carcinoma (NSCLC). The anti-ALK presented no staining on formalin fixed ALK negative NSCLC tissue and positive staining on FFPE ALK positive NSCLC tissue using immunohistochemistry.

Supplied As: Purified antibody with 0.2% BSA and 15mM sodium azide.



References:

1. S, van den Borne BE, et al. *Clin Cancer Res.* 2017; 23:4251-4258.
2. Shi R, et al. *J Thorac Oncol.* 2016; 11:2248-2252.
3. Rooper LM, et al. *Hum Pathol.* 2016; 51:139-45.

Formalin-fixed, paraffin-embedded human lung adenocarcinoma with ALK translocation stained with anti-ALK antibody using peroxidase-conjugate and DAB chromogen. Note cytoplasmic staining of tumor cells

Cat. #Z2289 (1.0 ml)