



**Mouse Anti-Human Cytokeratin AE1/AE3,**

**CatNo**

**K006**

monoclonal

BatchNo: See Label  
Expiration Date: See Label  
Storage: 2-8°C

<b>Clone Number:</b>	AE1/AE3
<b>Volume/Quantity:</b>	100 µg/100 µl
<b>Product Form:</b>	Purified IgG - liquid
<b>Preparation:</b>	Monoclonal antibodies were collected from the ascites and purified by sodium sulphate precipitation.
<b>Buffer:</b>	Borate buffered saline pH8.0
<b>Preservatives Stabilisers:</b>	0.09% Sodium Azide (NaN <sub>3</sub> )
<b>Approx. Protein Concentrations:</b>	IgG concentration 1 mg/ml
<b>Immunogen:</b>	Human epidermal keratins
<b>Fusion Partners:</b>	Spleen cells from an immunised BALB/c mouse were fused with cells of the mouse P3 myeloma cell line.
<b>Isotype:</b>	IgG1 for both (Mouse)
<b>Specificity:</b>	Keratins are a group of water-insoluble proteins that form monofilaments, a class of intermediate filament. These filaments form part of the cytoskeletal complex in epidermis and in most other epithelial tissues. Nineteen human epithelial keratins are resolved with two-dimensional gels electrophoresis (1). These can be divided into acid (pI <5.7) and basic (pI >6.0) subfamilies. Anti-Keratin AE1 recognizes the 56.5, 50, 50', 48, and 40 kD keratins of the acidic subfamily. Anti-Keratin AE3 recognizes all members of the basic subfamily. Anti-Keratin AE1 And AE3 monoclonal antibodies have been used to characterize the source of various neoplasms and to study the distribution of keratin-containing cells in epithelia during normal development and during the development of epithelial neoplasms (8-13).
<b>Species Cross Reactivity:</b>	Human, mouse, monkey, rat, rabbit, bovine and chicken.

**Applications:**

Suggested Working Dilution

		Suggested Working Dilution
FlowCytometry	Not tested	0.5 – 1 µg x 10 <sup>6</sup> cells
Immunohistology-frozen	Yes	0.5 – 2 µg/ml
Immunohistology-paraffin	Yes	0.5 – 2 µg/ml
Immunofluorescence	Yes	1 – 2 µg/ml
ELISA	Not tested	
Immunoprecipitation	Not tested	
Western Blotting	Yes	
Radioimmunoassay	Not tested	

Where this antibody has not been tested for use in a particular technique this does not necessarily exclude its use in such procedures. Suggested working dilutions are given as a guide only. It is recommended that the user titrates the antibody for use in their own system using appropriate negative/positive controls.

K006 230109-1/2





## Mouse Anti-Human Cytokeratin AE1/AE3,

CatNo

**K006**

monoclonal

### Immunohistology

<b>Pre-treatment:</b>	Proteolytic (0.1% Pronase LINARIS CatNo E110) treatment enhances specific staining of formalin-fixed paraffin-embedded tissue sections and allows higher dilutions of the antibody to be used (14).
<b>Recommended Secondary Reagents:</b>	F(ab') <sub>2</sub> rabbit anti-mouse IgG HRP conjugate – (LINARIS CatNo LST0013B) Vectastain <sup>®</sup> ABC Mouse IgG (Vector CatNo AK-5002) and Substrate-Kit e.g. Vector <sup>®</sup> Red (Vector CatNo SK-5100). Vectastain <sup>®</sup> ABC-Elite Mouse IgG (Vector CatNo PK-6102) and Peroxidase Substrate-Kit e.g. DAB (LINARIS CatNo E108) or HistoGreen (LINARIS CatNo E109).
<b>Recommended Negative Controls:</b>	Mouse IgG1 Negative Control (LINARIS CatNo ITC0928)

### References

1. Moll, R., Franke, W.W., Schiller, D.L., Geiger, B. and Krepler, R. (1982) *Cell* **31**:11.
2. Sun, T.T., Eichner, R., Cooper, D. Schermer, A., Nelson, W.G. and Weiss, R. A. (1984) *The Cancer Cell* **1**:169.
3. Cooper, D., Schermer, A. and Sun, T, T. (1985) *Lab Invest.* **52**,243.
4. Sun, T. T. Tseng, S. C.G., Huang, A.J.W., Cooper, D. Lynch, M.H., Weiss, T., Eichner, R. and Schermer. (1985) "Monoclonal Antibody Studies of Keratin Expression: A Review" in *Intermediate Filaments* (Wang, E. et al. eds.) Vol 455, p. 307, New York Academy of Sciences.
5. Weiss, R.A., Eichner, R. and Sun, T.T. (1984) *J. Cell Biol.* **98**:1397.
6. Woodcock-Mitchel, J. and Sun, T.T. (1982) *Cell* **30**:361.
7. Tseng, D.C.G., Jarvinen, M.J., Nelson, W.G., Huang, J. W., Woodcock- Mitchel, J. and Sun, T.T. (1982) *Cell* **30**:361.
8. Asch, B.B. and Asch, H.L. (1986) *Cancer Research.* **46**:1255.
9. Rodriguez, M.M., Krachmer, J.H. and Sun, T.T. (1986) *Trans Am. Ophthalmo. Soc.* **84**:146.
10. Clausen, H. Vedtofte, P. Moe, D., Dabelsteen, E. Sun, T.T. and Dale, B. (1986) *J. Invest. Dermatol.* **86**:249.
11. Laster, J.J., Itoh, T., Palker, T.J. and Haynes, B.F. (1986) *Differentiation* **31**:67.
12. Klein-Szanto, A.J., Boysen, M. and Reith, A. (1987) *Arch. Pathol. Lab. Med.* **111**:1057.
13. Reibel, J., Scholdt, M. and Dabelsteen, E. (1985) *Acta Pathol.Microbiol. Immunol. Scand.* **93**; 159.
14. Pinkus, G.S., O'Conner, E.M., Etheridge, C.L. and Carson, J.M. (1985) *J. of Histochemistry and Cytochemistry* **333**:465.
15. Hsu, S.M., Raine, L. and Fanger, h. (1981) *Am. J. Clin. Pathol.* **75**:734.
16. Falini, B. and Taylor, C.R. (1983) *Arch. Pathol. Lab. Med.* **107**:105.
17. Harlow, E. and Lane, D. (1988) *Anhtibodies: A Laboratory Manual* p. 359, Cold Spring Harbor, NY.
18. Taylor, C.R. (1978) *Arch. Pathol. Lab. Med.* **102**:113.

<b>Storage Conditions:</b>	Store at 2-8°C. Should this product contain a precipitate we recommend microcentrifugation before use.
<b>Shelf Life:</b>	12 months from date of despatch.
<b>Health and Safety Information:</b>	(A full Health and Safety assessment is available upon request) This product contains sodium azide: a POISONOUS and HAZARDOUS SUBSTANCE which should be handled by trained staff only.

K006 230109-2/2

**For Research purposes only. Not for therapeutic or diagnostic use.**

Manufacturer

**BIOZOL**  
FIT FOR SCIENCE

**BIOZOL**

Diagnostica Vertrieb GmbH  
Leipziger Straße 4  
85386 Eching

Phone +49 (89) 3799 666 6  
Fax +49 (89) 3799 666 99  
E-Mail info@biozol.de  
www biozol.de



Management System  
ISO 9001:2015  
www.tuv.com  
ID 9000019771



Page 2 of 2