

# Datasheet: MCA890F BATCH NUMBER 157753

Description:	MOUSE ANTI HUMAN CYTOKERATIN 14:FITC
Specificity:	CYTOKERATIN 14
Format:	FITC
Product Type:	Monoclonal Antibody
Clone:	LL002
Isotype:	IgG3
Quantity:	0.1 mg

## **Product Details**

#### **Applications**

This product has been reported to work in the following applications. This information is derived from testing within our laboratories, peer-reviewed publications or personal communications from the originators. Please refer to references indicated for further information. For general protocol recommendations, please visit <a href="www.bio-rad-antibodies.com/protocols">www.bio-rad-antibodies.com/protocols</a>.

	Yes	No	Not Determined	Suggested Dilution
Flow Cytometry (1)	•			Neat - 1/10
Immunofluorescence	-			

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.

(1)Membrane permeabilisation is required for this application. Bio-Rad recommends the use of Leucoperm<sup>™</sup> (Product Code <u>BUF09</u>) for this purpose.

Target Species	Human					
Species Cross	Reacts with: Elep	ohant, Dog, Pig, Lion				
Reactivity	<b>N.B.</b> Antibody reactivity and working conditions may vary between species. Cross reactivity is derived from testing within our laboratories, peer-reviewed publications or personal communications from the originators. Please refer to references indicated for further information.					
Product Form	Purified IgG conjugated to Fluorescein Isothiocyanate Isomer 1 (FITC) - liquid					
	Eluorophoro	Excitation Max (nm)	Emission Max (nm	n)		
Max Ex/Em	Fluorophore	=xonanon max (mm)				

## supernatant

Buffer Solution	Phosphate buffered saline
Preservative	0.09% Sodium Azide (NaN <sub>3</sub> )
Stabilisers	1% Bovine Serum Albumin
	176 Beville Garani, ilbanini
Approx. Protein Concentrations	IgG concentration 0.1mg/ml
Immunogen	Last 15 C-terminal residues of human cytokeratin 14 conjugated to thyroglobulin.
External Database	UniProt:
Links	P02533 Related reagents
	1 02333 Related reagents
	Entrez Gene:
	3861 KRT14 Related reagents
RRID	AB_872024
Specificity	<b>Mouse anti Human Cytokeratin 14 antibody, clone LL002</b> recognizes cytokeratin 14, a type I intermediate filament, expressed by stratifying epithelial cells and can be used to distinguish these cell types from simple epithelial cells, which do not express cytokeratin 14.
	Mouse anti cytokeratin 14, clone LL002 has been reported to be suitable for use in Western blotting ( <u>Alam et al. 2011</u> )
Flow Cytometry	Use 10ul of the suggested working dilution to label 1x10 <sup>6</sup> cells in 100ul.
References	1. Purkis, P.E. <i>et al.</i> (1990) Antibody markers of basal cells in complex epithelia. <u>J Cell Sci. 97 ( Pt 1): 39-50.</u>
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	malignant breast: tools for dissecting the role of the microenvironment in breast cancer
	progression. Breast Cancer Res. 11: R3
	7. Eastman, RJr. et al. (2010) Fibroblast growth factor-10 signals development of von
	Brunn's nests in the exstrophic bladder. <u>Am J Physiol Renal Physiol.299:F1094-110.</u>
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- of the lactating mammary gland of the African elephant (*Loxodonta africana*, Proboscidea) Zoomorphology 123:155-67
- 9. Alam H *et al.* (2011) Loss of keratins 8 and 18 leads to alterations in  $\alpha6\beta4$ -integrin-mediated signalling and decreased neoplastic progression in an oral-tumour-derived cell line. J Cell Sci. 124 (Pt 12): 2096-106.
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- 12. Takahashi, C. *et al.* (2010) Newly established cell lines from mouse oral epithelium regenerate teeth when combined with dental mesenchyme. <u>In Vitro Cell Dev Biol Anim.</u> 46: 457-68.
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- 15. Varley, C.L. *et al.* (2004) Activation of peroxisome proliferator-activated receptor-gamma reverses squamous metaplasia and induces transitional differentiation in normal human urothelial cells. <u>Am J Pathol. 164: 1789-98.</u>
- 16. Abdeen, S.K. *et al.* (2011) Wwox inactivation enhances mammary tumorigenesis. Oncogene. 30: 3900-6.
- 17. Matos, A.J. *et al.* (2006) Detection of lymph node micrometastases in malignant mammary tumours in dogs by cytokeratin immunostaining. Vet Rec. 158: 626-30.
- 18. Turner, A. *et al.* (2011) Transplantation of autologous differentiated urothelium in an experimental model of composite cystoplasty. Eur Urol. 59: 447-54.
- 19. Munz, B. *et al.* (1999) Overexpression of activin A in the skin of transgenic mice reveals new activities of activin in epidermal morphogenesis, dermal fibrosis and wound repair. EMBO J. 18: 5205-15.
- 20. Mwase, M. *et al.* (2013) Cutaneous Squamous Cell Carcinoma presenting as a Wound with Discharging Sinus Tracts in a Wild African Lion (*Panthera leo*). <u>J Comp Pathol. pii:</u> S0021-9975(13)00106-0.
- 21. Honda, K. & Tomooka, Y. (2016) Nerve-independent and ectopically additional induction of taste buds in organ culture of fetal tongues. *In Vitro* Cell Dev Biol Anim. 52 (9): 911-9.
- 22. Hustler, A. *et al.* (2018) Differential transcription factor expression by human epithelial cells of buccal and urothelial derivation. <u>Exp Cell Res. 369 (2): 284-294.</u>
- 23. Ogihara, K. & Madarame, H. (2020) Pancreatic adenosquamous carcinoma with invasion to the spleen in a cat. <u>J Vet Med Sci. 82 (9): 1395-9.</u>

#### Storage

Store at +4°C or at -20°C if preferred.

Storage in frost-free freezers is not recommended.

This product should be stored undiluted. This product is photosensitive and should be protected from light.

Avoid repeated freezing and thawing as this may denature the antibody. Should this product contain a precipitate we recommend microcentrifugation before use.

#### Guarantee

12 months from date of despatch

**Health And Safety** 

Material Safety Datasheet documentation #10041 available at:

Information https://www.bio-rad-antibodies.com/SDS/MCA890F

10041

Regulatory

For research purposes only

## **Related Products**

### **Recommended Useful Reagents**

LEUCOPERM (BUF09)
HUMAN SEROBLOCK (BUF070A)
HUMAN SEROBLOCK (BUF070B)

North & South Tel: +1 800 265 7376

Worldwide

Tel: +44 (0)1865 852 700

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To find a batch/lot specific datasheet for this product, please use our online search tool at: bio-rad-antibodies.com/datasheets 'M369113:200529'

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