

**Mouse Anti-FosB [MD397]: MC0655, MC0655RTU7**

**Intended Use:** For Research Use Only

**Description:** The Fos family of nuclear oncogenes includes c-Fos, FosB, Fos-related antigen 1 (FRA1), and Fos-related antigen 2 (FRA2). FosB responds to various cellular stimuli and shares approximately 70% sequence homology with c-Fos. However, Fos B exhibits distinct functional characteristics from c-Fos. While c-Fos can form both homo- and heterodimers with c-Jun proteins to bind DNA TPA response elements (TREs), FosB primarily operates through heterodimer formation with c-Jun and JunB proteins to activate transcription. The regulation of FosB activity involves sophisticated post-translational modifications, particularly phosphorylation, which proves essential for FosB's stability and transcriptional activity. FosB plays vital roles in cell differentiation, proliferation, and stress responses. Deregulated expression of c-Fos, FosB, or FRA2 can result in neoplastic cellular transformation; however, FosB2 lacks the ability to transform cells

**Specifications**

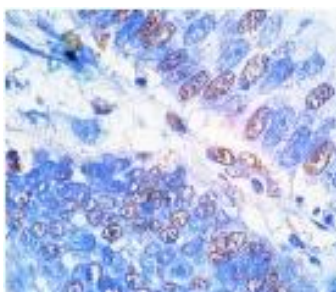
Clone:	MD397
Source:	Mouse
Isotype:	IgM/ $\kappa$
Reactivity:	Human, mouse, rat
Immunogen:	Fragment aa 75-150 to the N-terminus of human Fos B protein
Localization:	Membrane
Formulation:	Antibody in PBS pH7.4, containing BSA and $\leq 0.09\%$ sodium azide (NaN <sub>3</sub> )
Storage:	Store at 2°- 8°C
Applications:	IHC, ELISA, IF, IP, WB
Package:	

Description	Catalog No.	Size
FosB [MD397] Concentrated	MC0655	1 ml
FosB [MD397] Prediluted	MC0655RTU7	7 ml

**IHC Procedure\***

Positive Control Tissue:	Breast or colon carcinoma, kidney, hippocampus
Concentrated Dilution:	25-200
Pretreatment:	Tris EDTA pH9.0, 15 minutes Pressure Cooker or 30-60 minutes water bath at 95°-99°C
Incubation Time and Temp:	30-60 minutes @ RT
Detection:	Refer to the detection system manual

\* Result should be confirmed by an established diagnostic procedure.



FFPE human colon carcinoma stained with anti-FosB using DAB

**References:**

1. Gestational intermittent hypoxia increases FosB-immunoreactive perikaryas in the paraventricular nucleus of the hypothalamus of adult male (but not female) rats. Danuzia Ambrozio-Marques, Exp Physiol. Nov;108, 2023.
2. The cancer/testis antigen CAGE with oncogenic potential stimulates cell proliferation by up-regulating cyclins D1 and E in an AP-1- and E2F-dependent manner. Elaine Por, et al. J Biol Chem. May 7;285(19):14475-85, 2010.
3. Immunohistochemical analysis of possible chemoresistance markers identified by micro-arrays on serous ovarian carcinomas. Bernard Têtu, et al. Mod Pathol. Aug;21(8):1002-10, 2008. doi: 10.1038/modpathol.2008.80.