

**MOUSE ANTI-HUMAN INTEGRIN alpha3 [CD49c]
ALEXA FLUOR[®] 488 CONJUGATED MONOCLONAL ANTIBODY**

CATALOG NUMBER:	MAB1952X	QUANTITY:	100 ug
LOT NUMBER:		CONCENTRATION:	1 mg/mL
CLONE NAME:	P1B5	HOST/ISOTYPE:	Ms IgG ₁
ALTERNATE NAMES:	CD49c, VLA-3 alpha		

BACKGROUND: Integrins are a family of dimeric, transmembrane proteins that mediate cell-cell and extracellular matrix adhesion. Signals transduced by integrins play a role in many biological processes, including cell growth, differentiation, migration and apoptosis. Integrin alpha subunits contain seven weak sequence repeats in the N-terminal region, which may be important in ligand binding, and have been predicted to fold cooperatively into a single beta-propeller domain with seven beta-sheets. The alpha-3 subunit (CD49c) is highly concentrated in epithelial cells where it strongly adheres to Laminin-5, and Laminin-5-induced rapid adhesion can be blocked by antibodies against the alpha-3 integrin subunit. The alpha-3 subunit exists in two different splice variants, denoted as "A" and "B". The only difference that results from this differential splicing is a total change in the cytoplasmic domain, while the extracellular domain stays the same. Knock-out mice lacking this subunit show prenatal lethality and abnormalities in the kidneys.

SPECIFICITY: Human alpha3 integrin

APPLICATIONS: Flow Cytometry
Immunofluorescence: 5-25 µg/mL
Optimal working dilutions must be determined by end user.

SPECIES REACTIVITY: Human. Reactivity with other species has not been determined.

PRESENTATION: Purified immunoglobulin conjugated to Alexa Fluor[®] 488 presented as liquid in PBS, 15 mg/nL BSA, containing 0.1% sodium azide as a preservative.

STORAGE/HANDLING: Maintain at 2-8°C in undiluted aliquots for up to 12 months from date of receipt.

RELATED REFERENCES: Ahmed, N et.al. (2002). Association between alphavbeta6 integrin expression, elevated p42/44 kDa MAPK, and plasminogen-dependent matrix degradation in ovarian cancer. *J. Cell. Biochem.* **84(4)** : 675-686.

Weaver, VM (2002). Beta-4 integrin dependent formation of polarized three dimensional architecture confers resistance to apoptosis in normal and malignant mammary epithelium. *Cancer Cell* **2** : 1-12.

For research use only; not for use as a diagnostic.

Important Note: *During shipment, small volumes of product will occasionally become entrapped in the seal of the product vial. For products with volumes of 200 µL or less, we recommend gently tapping the vial on a hard surface or briefly centrifuging the vial in a tabletop centrifuge to dislodge any liquid in the container's cap.*

