

**Anti-Propertin (human)
Mouse monoclonal antibody**

Subclass: IgG₁/k

PRODUCT NO.

HYB 039-04

Clone: 10C5

PRESENTATION

Preparation: Protein-A/G purified

Content: Available in 200 µL and 1 mL volumes, 1 mg/mL

Solvent: 0.01 M phosphate buffer, pH 7.4, containing 0.5 M NaCl and 15 mM sodium azide

Storage: In the dark at 4-8°C

ANTIGEN

Propertin in plasma is a mixture of cyclic dimers, trimers and tetramers. The molecular weight of the glycosylated monomer is 53 kDa (3). Propertin is a regulator protein of the alternative complement pathway. It stabilizes the C3 convertase exerting its effect by binding to C3b in the C3bBb complex and thereby inhibiting cleavage of C3b by factor I and increasing the affinity for factor B. Serum concentration is approximately 25 µg/mL (2,3).

IMMUNOGEN

Propertin isolated from human plasma adsorbed onto aluminum hydroxide gel (1)

SPECIFICITY

HYB 039-04 is specific for human propertin

EPI TOPE SPECIFICITY

Epitope specificity differs from that of HYB 039-06 but slightly overlap as determined by inhibition ELISA.

REACTIVITY

HYB 039-04 reacts strongly with propertin isolated from human plasma when tested in sandwich ELISA using HYB 039-04 as capture and biotinylated detection antibody, only very low reaction is seen with plasma from patients deficient in propertin. HYB 039-04 works equally well in ELISA with purified propertin coated directly onto the microtiter well. In Western blotting after SDS-PAGE HYB 039-04 reacts with propertin in both reduced (subunits of 25 kDa and 56 kDa) as well as unreduced forms (220 kDa).

CULTURE MEDIUM

RPMI 1640 with 10% fetal calf serum

FUSION PARTNER

X63-Ag8.653

IMMUNIZATION

Female CF1 x BALB/c mice immunized by intraperitoneal injection

APPLICATION

Method	Usability	Dilution guideline	References
ELISA	Yes	1/10,000	
Immunoblotting	Yes		
Immunohistochemistry	Not determined		

The dilution guideline for ELISA is based on use as detection antibody for antigen coated at 0.15 µg/ml. Users should determine the optimal dilutions for their own purposes.

REFERENCES

1. Gotze O, Medicus RG, Muller-Eberhard HJ (1977) Alternative pathway of complement: nonenzymatic, reversible transition of precursor to active propertin. J Immunol 118:525-532.
2. Nielsen HE, Koch C (1987) Congenital propertin deficiency and meningococcal infection. Clin Immunol Immunopathol 44:134-139.
3. Fijen CA, Bogaard R, Schipper M, Mannens M, Schlesinger M, Nordin FG, Dankert J, Daha MR, Sjoholm AG, Truedsson L, Kuijper EJ (1999) Propertin deficiency: molecular basis and disease association. Mol Immunol 36:863-867.
4. Bathum L, Hansen H, Teisner B, Koch C, Garred P, Rasmussen K, Wang P (2005) Association between combined propertin and mannose-binding lectin deficiency and infection with *Neisseria meningitidis*. Mol Immunol 43:473-479

CONDITIONS

All products are supplied on the understanding that they are for in vitro use only. The information and product are offered without guarantee as the ultimate conditions of use are beyond our control. The animals from which this product was derived have not been exposed to or inoculated with any livestock or poultry disease agents exotic to the United States or Western Europe, and did not originate from facilities where work with exotic disease agents affecting livestock or avian species is carried out.