

**Anti α_1 -antitrypsin (human, native and denatured)****Mouse monoclonal antibody**

Subclass: IgG1/k

PRODUCT NO.

HYB 191-01

PRESENTATION

Preparation: Protein-A/G purified
 Content: Available in 200 μ L and 1 mL, 1 mg/mL
 Solvent: 0.01 M phosphate buffer, pH 7.4, with 0.5 M NaCl and 15 mM sodium azide
 Storage: In the dark at 4-8°C

ANTIGEN

The serum glycoprotein α_1 -antitrypsin also called α_1 - AT, is a typical member of the serpin family (serine protease inhibitors), and, an inhibitor of trypsin. α_1 - AT is synthesized in the liver thus as a single polypeptide chain of approximately 51 kDa showing a marked degree of genetic polymorphism due to the presence of over 20 different alleles. Individuals homozygous for α_1 - AT deficiency are predisposed to pulmonary emphysema and hepatic cirrhosis.

IMMUNOGEN

 α_1 - AT isolated from human plasma

SPECIFICITY

HYB 191-01 is specific for human α_1 - AT (native and denatured).

EPIOTOPE SPECIFICITY

Epitope specificity differs from that of HYB 185-02.

REACTIVITY

Reacts strongly with α_1 -AT, Strong reaction is seen in ELISA with native and denatured α_1 - AT coated directly onto the microtiter well. Detect only native α_1 - AT in sandwich ELISA with a polyclonal capture antibody (e.g. DAKO A0012). Reacts with native and denatured (released and unreleased) α_1 -AT in immunoblotting. In Western blotting after SDS-PAGE, HYB 191-01 reacts with native and denatured α_1 - AT in reduced as well as non-reduced forms.

CULTURE MEDIUM

RPMI 1640 with 2-10% fetal calf serum

FUSION PARTNER

X63-Ag8.653.

IMMUNIZATION

Female CF1 x Balb/c mice, immunized i.p. with antigen adsorbed onto Al(OH)₃.

APPLICATION

Method	Usability	Dilution guideline	References
ELISA	Yes	1:15,000	
Immunoblotting	Yes		
Immunohistochemistry	Not determined		

The dilution guideline for ELISA is based on use as detection antibody for antigen coated at 0.1-1 μ g/ml. Users should determine the optimal dilutions for their own purposes.

REFERENCES

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.