

**Anti Surfactant protein D (human, hSP-D)
Mouse Monoclonal Antibody, biotinylated**Subclass: IgG_{2a}/κ

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| PRODUCT NO. | HYB 246-04 | B |
| PRESENTATION | Preparation: Biotinylated Content: 100 µl, 1 mg/mL Solvent: 0.01 M phosphate buffer, pH 7.4, with 0.5 M NaCl and 15mM sodium azide Storage: In the dark at 4-8°C | |
| ANTIGEN | Surfactant protein D (SP-D) is synthesized and secreted by lung epithelial cells. It belongs to group III of the family of C-type lectins and members of this group has overall structure consisting of multiple globular 'head' regions linked by triple-helical, collagen-like, strands. This group also includes SP-A and the serum proteins mannan-binding protein, conglutinin and collectin-43, all of which have been shown to bind to the C1q receptor found on a wide variety of cells. Both SP-D and SP-A have been shown to enhance oxygen radical production by alveolar macrophages. The serum concentration is approximately 700 ng/ml in healthy individuals (1,4). | |
| IMMUNOGEN | Native human SP-D purified from late pregnancy amniotic fluid | |
| SPECIFICITY | HYB 246-04 is specific for SP-D from amniotic fluid, serum and bronchioalveolar lavage. HYB 246-04 does not influence SP-D's binding to carbohydrates. | |
| EPITOPE SPECIFICITY | Epitope is localised within the C-terminal neck CRD (carbohydrate recognition domain) of SP-D | |
| REACTIVITY | HYB 246-04 is suitable as detection antibody in sandwich ELISA in combination with a polyclonal antibody against SP-D. Binding of HYB 246-04 is Ca ⁺⁺ dependent. In Western blotting after SDS-PAGE HYB 246-04 reacts with non-reduced SP-D only | |
| CULTURE MEDIUM | Dulbecco's modified Eagle's medium with 10% fetal calf serum | |
| FUSION PARTNER | X63-Ag8.653. | |
| IMMUNIZATION | Female CF1 x BALB/c mice immunized i.p. with immunogen adsorbed onto Al(OH) ₃ | |
| REFERENCES | <ol style="list-style-type: none">1. Holmskov UL (2000) Collectins and collectin receptors in innate immunity. <i>APMIS Suppl</i> 100:1-59.2. Johansson J, Curstedt T (1997) Molecular structures and interactions of pulmonary surfactant components. <i>Eur J Biochem</i> 244:675-693.3. Husby S, Herskind AM, Jensenius JC, Holmskov U (2002) Heritability estimates for the constitutional levels of the collectins mannan-binding lectin and lung surfactant protein D. A study of unselected like-sexed mono- and dizygotic twins at the age of 6-9 years. <i>Immunology</i> 106:389-394.4. Leth-Larsen R, Nordenbaek C, Tornoe I, Moeller V, Schlosser A, Koch C, Teisner B, Junker P, Holmskov U (2003) Surfactant protein D (SP-D) serum levels in patients with community-acquired pneumonia. <i>Clinical Immunology</i> 108:29-37.5. Leth-Larsen R, Garred P, Jensenius H, Meschi J, Hartshorn K, Madsen J, Tornoe I, Madsen OH, Sørensen G, Crouch E, Holmskov U (2005) A common Polymorphism in the SFTPD Gene Influences Assembly, Function, and Concentration of Surfactant Protein D. <i>J Immunol</i> 174:1532-1538. | |

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.