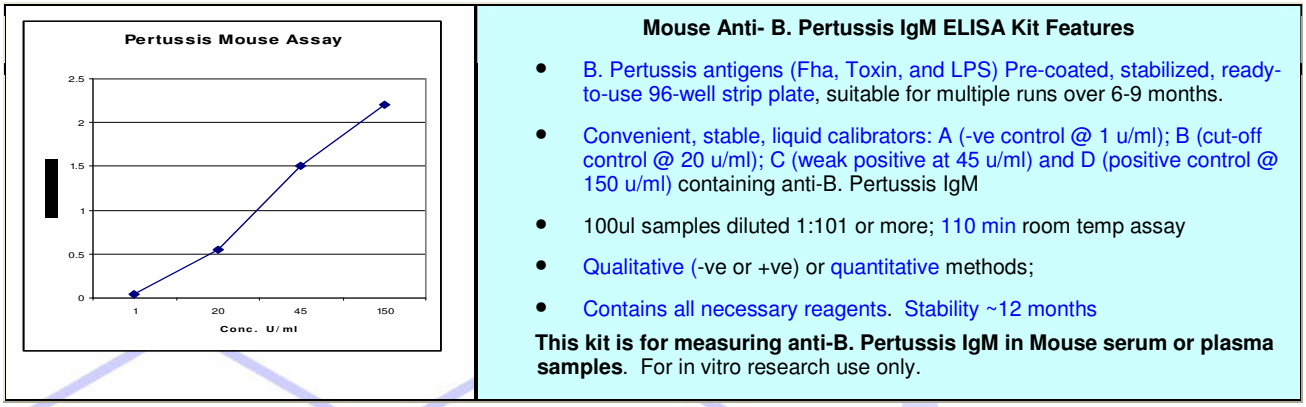
ALPHA DIAGNOSTIC INTERNATIONAL

Mouse Anti-B. Pertussis IgM ELISA Kit, Cat# 960-140-PMM

Mouse Anti-B. Pertussis IgM ELISA kit | Quantitative | **Standards 0 -150 u/ml** | **Sample**=100 ul (diluted); **110 min** assay



Mouse Anti- B. Pertussis IgM ELISA Kit Features

- B. Pertussis antigens (Fha, Toxin, and LPS) Pre-coated, stabilized, ready-to-use 96-well strip plate, suitable for multiple runs over 6-9 months.
- Convenient, stable, liquid calibrators: A (-ve control @ 1 u/ml); B (cut-off control @ 20 u/ml); C (weak positive at 45 u/ml) and D (positive control @ 150 u/ml) containing anti-B. Pertussis IgM
- 100ul samples diluted 1:101 or more; 110 min room temp assay
- Qualitative (-ve or +ve) or quantitative methods;
- Contains all necessary reagents. Stability ~12 months

This kit is for measuring anti-B. Pertussis IgM in Mouse serum or plasma samples. For in vitro research use only.

Assay Procedure: Allow all reagents to reach room temperature. Arrange and label required number of strips.

Step 1. Pipet **100 ul each of pre-diluted standards**, samples (diluted 1:101 or more). Mix gently and incubate at room temp for **60 min.**
Step 2. **Aspirate and wash** 3X. **Add 100 ul of antibody-HRP** Conjugate to all wells, mix gently and incubate at room temp for **30 min.**
Step 3. **Aspirate and wash** 4X. Add **100 ul of TMB Substrate** solution to all wells, mix gently, and incubate at room temp for **15 min.**
Step 4. Pipet **100 ul of stop solution** into each well and mix gently (blue color turns yellow). **Measure absorbance at 450 nm**. Determine antibody concn in each sample using the calibrators (results are expressed as positive or negatives or in units/ml).

Interpretation of Results

Negative: <18 u/ml Equivocal: 18-22 u/ml; Positive: >22

Performance Characteristics

Intra-Assay-Precision:	5.0 %	Inter-Assay-Precision 4.3 %	Inter-Lot-Precision 2,6 – 4.5 %
Analytical Sensitivity:	0,98 U/mL	Recovery 106 – 114 %	Linearity 78 – 124 %
Cross-Reactivity:	No cross-reactivity to RSV, Adenovirus and Parainfluenza IgG		
Interferences:	No interferences to bilirubin up to 0.3 mg/mL, hemoglobin up to 8.0 mg/mL und triglycerides up to 5.0 mg/mL		
Clinical Specificity:	84 %	Clinical Sensitivity: 100 %	

General Information

Pertussis, also known as the whooping cough, is a highly contagious disease caused by the bacterium Bordetella pertussis. It derived its name from the "whoop" sound made from the inspiration of air after a cough. Despite generally high coverage with the DTP and DTaP vaccines, pertussis is one of the leading causes of vaccine-preventable deaths world-wide. Ninety percent of all cases occur in the Third World. It is transmitted by airborne infection. The gram negative Coccobacillus produces a series of biologically active molecules. The different compounds appear either during the pathogenesis or during the process of immunization against pertussis and show different effects. A characterization has been made for the pertussis toxin (pt), the filamentery haemagglutinine (fha) and different lipopolysaccharides (lps). Pertussis shows a high rate of transmission (rates of infection of over 90 % have been found for non-vaccinated household members) and can cause severe diseases, especially for very young children. From10749 patients under one year between 1980 and 1989 69 % were brought into hospital, 22 % suffered from pneumonia, 0.9 % showed an Encephalopathy and 0.6 % died.For older children and adults (including already vaccinated persons) the infection may be observed by an unspecified bronchitis or inflammation of the upper respiratory tracts. Even asymptomatic cases are quite common. The serological response following pertussis disease or immunization with pertussis vaccine has been measured with agglutination assays, precipitins, complement fixation and enzyme-linked immunosorbentassay (ELISA).Enzyme-linked immunosorbent assays, in which Bordetella antigen (containing toxin, FHA and LPS and standardized in U/ml) is bound to a solid phase support, are sensitive, easy to perform and can be used both to determine seropositivity with a single serum and to indicate recent Bordetella infection by determination of IgM and IgA..

B. pertussis vaccine was first developed in 1920 using whole bacterium. In 1942, the whole-cell pertussis vaccine was combined with diphtheria and tetanus toxoids to generate the first DTP combination vaccine. **Whole cell vaccines** have some side effects. **Acellular pertussis vaccine** consisting of purified haemagglutinins (HAs: filamentous HA and leucocytosis-promoting-factor HA), which are secreted by B. pertussis into the culture medium are being using alone or in combination with DTaP (aP represents acellular vaccine).

There are several Pertussis vaccines available that can be used alone or in combination with other diseases (multivalent). It is often necessary to monitor the efficacy of vaccines and determine the anti-Pertussis Ig levels in patients or for clinical trial using new formulation of vaccines. ADI's mouse Anti- Pertussis Toxoid IgM ELISA kit is an immunoassay for the quantitative determination of IgM class antibodies against Pertussis Trihibit (DTAP/Hib), ActHib (Hib-PRP-T), Daptacel (DTAP), Tripedia (DTAP), Adacel (tetanus, Diphtheria, Acellular Pertussis) - Sanofi Pasteur; PedvaxHib (Hib-PRP-OMP) – Merck; Pediarix (DTAP/HepB/IPV), Infanrix (DTAP), Boostrix (Tetanus, Diphtheria, Acellular Pertussis) - GlaxoSmithKline

Related ELISA kits
Human: #960-100-PHA (**anti-IgA**); #960-110-PHG (**anti-IgG**); #960-120-PHM (**anti-IgM**)
Mouse: #960-130-PMG (**anti-IgG**); # 960-140-PHM (**anti-IgM**) rev 100803JA

Alpha Diagnostic Intl Inc., 6203 Woodlake Center Dr, San Antonio, TX 78244, USA; **Email**: service@4adi.com
☎ (800) 786-5777; (210) 561-9515; Fax: (210) 561-9544; Web **Site**: www.4adi.com