

## Product datasheet for TA396881S

### ospB Rabbit Polyclonal Antibody

#### **Product data:**

#### OriGene Technologies, Inc.

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| Product Type:         | Primary Antibodies   |
|-----------------------|--|
| Applications:         | ELISA, WB  |
| Recommended Dilution: | WB: 1:1,000<br>ELISA: 1:13,000   |
| Reactivity:           | Borrelia burgdorferi   |
| Host:                 | Rabbit   |
| Clonality:            | Polyclonal   |
| Immunogen:            | MBP-fusion protein corresponding to Borrelia burgdorferi OspB protein.   |
| Specificity:          | This product was Protein-A purified and cross-adsorbed against MBP from monospecific<br>antiserum by chromatography. This antibody is specific for Borrelia burgdorferi OspB protein.<br>A BLAST analysis was used to suggest cross-reactivity with OspB from B. burgdorferi, afzelii,<br>spielmanii, and garinii sources based on 100% homology with the immunizing sequence, and<br>with B. valaisiana based on 99% homology. Cross-reactivity with OspB from other sources has<br>not been determined.    |
| Formulation:          | 0.02 M Potassium Phosphate, 0.15 M Sodium Chloride, pH 7.2   |
| Concentration:        | 1.1 mg/mL - lot specific   |
| Conjugation:          | Unconjugated   |
| Storage:              | Store vial at -20° C or below prior to opening. This vial contains a relatively low volume of reagent (25 $\mu$ L). To minimize loss of volume dilute 1:10 by adding 225 $\mu$ L of the buffer stated above directly to the vial. Recap, mix thoroughly and briefly centrifuge to collect the volume at the bottom of the vial. Use this intermediate dilution when calculating final dilutions as recommended below. Store the vial at -20°C or below after dilution. Avoid cycles of freezing and thawing. |
| Stability:            | Expiration date is three (3) months from date of receipt.  |
| Database Link:        | <u>P17739</u>  |



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#### **GRIGENE** ospB Rabbit Polyclonal Antibody – TA396881S

Background: OspB, is one of the major Outer Surface Proteins of the outer membrane of Borrelia burgdorferi, which is composed of various unique outer surface proteins (Osp) that have been characterized (OspA through OspF). The Osp proteins are lipoproteins anchored by Nterminally attached fatty acid molecules to the membrane. They are presumed to play a role in virulence, transmission, or survival in the tick. Two of the major surface Ag of Borrelia burgdorferi, the 31-kDa OspA and 34-kDa OspB proteins, show a high degree of sequence similarity, are encoded by a 49-kb plasmid and share a common promoter, and are coordinately transcribed. OspA, OspB, and OspD are expressed by B. burgdorferi residing in the gut of unfed ticks, suggesting that they promote the persistence of the spirochete in ticks between blood meals. OspB has a contributing role in the adherence of B. burgdorferi to the tick gut. B. burgdorferi has the ability to vary its surface proteins in response to immune attack.

# Synonyms:rabbit anti-OspB Antibody, Outer surface protein B, Borrelia burgdorferi OspB, locus BB\_A16Note:This protein-A purified antibody has been tested for use in ELISA and Western blotting.<br/>Specific conditions for reactivity should be optimized by the user. Expect a band<br/>approximately 30.3 kDa in size corresponding to Borrelia burgdorferi OspB protein by

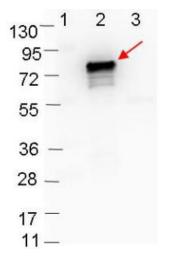
Western blotting in the appropriate cell lysate or extract.

#### **Product images:**

| 130-1 | 2  |   | 3 |
|-------|----|---|---|
| 95-   | -  |   | < |
| 72 —  | 10 | 1 |   |
| 55 —  |    |   |   |
| 36 —  |    |   |   |
| 28 —  |    |   |   |
| 17 —  |    |   |   |
| 11 —  |    |   |   |

Western blot showing detection of 0.1 µg of recombinant OspB protein. Lane 1: Molecular weight markers. Lane 2: MBP-OspB fusion protein (arrow; expected MW = 72.7 kDa). Lane 3: MBP alone. Protein was run on a 4-20% gel, then transferred to 0.45 µm nitrocellulose. After blocking with 1% BSA-TTBS (p/n MB-013, diluted to 1X) overnight at 4°C, primary antibody was used at 1:1000 at room temperature for 30 min. HRP-conjugated Goat-Anti-Rabbit (p/n 611-103-122) secondary antibody was used at 1:40,000 in MB-070 blocking buffer and imaged on the VersaDoc™ MP 4000 imaging system (Bio-Rad).

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Western blot showing detection of 0.1 µg of recombinant OspB protein. Lane 1: Molecular weight markers. Lane 2: MBP-OspB fusion protein (arrow; expected MW = 72.7 kDa). Lane 3: MBP alone. Protein was run on a 4-20% gel, then transferred to 0.45 µm nitrocellulose. After blocking with 1% BSA-TTBS (p/n MB-013, diluted to 1X) overnight at 4°C, primary antibody was used at 1:1000 at room temperature for 30 min. HRP-conjugated Goat-Anti-Rabbit (p/n 611-103-122) secondary antibody was used at 1:40,000 in MB-070 blocking buffer and imaged on the VersaDoc™ MP 4000 imaging system (Bio-Rad).

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