

Product Information

E. coli PROTEINS-AGAROSE

Product No. **A 2210**

Product Description

The *E. coli* Proteins-Agarose is composed of bacterial extract prepared from three *E. coli* strains (TG-1, XL-1, DH-57) coupled to cyanogen bromide-activated cross-linked 4B agarose. The immobilized support is a low non-specific binding matrix, thus not influencing the specific antibody performance. The product is supplied as a 1:1 suspension in 0.01 M phosphate buffered saline, pH 7.4.

When immunizing animals with a recombinant protein raised in *E. coli*, the preparation may carry some contamination of host bacteria proteins. These may serve as non-specific immunogens resulting in antisera that react with several different proteins which are not the protein of interest. The antibodies obtained may cause false positive and non-specific reactions in immunological assay and may even mask specific signals of the desired antibody. Contaminating antibodies in polyclonal antisera or IgG fractions that react with such antigens produced by *E. coli* may be removed by immunoabsorption. The most effective procedure is to expose the crude antiserum or an IgG fraction, raised against a recombinant antigen prepared in *E. coli*, to lysates of *E. coli* (same strains) that have been immobilized to activated-agarose. This process can be repeated several times until all of the anti-*E. coli* protein antibodies have been removed.

Precautions and Disclaimer

Due to the sodium azide content a material safety sheet (MSDS) for this product has been sent to the attention of the safety officer of your institute. Consult the MSDS for information regarding hazardous and safe handling practices.

Specificity

E. coli Proteins-Agarose prepared from the three *E. coli* strains may capture non-specific antibodies formed in animals immunized with recombinant antigens produced in these *E. coli* bacteria strains.

Uses

E. coli Proteins-Agarose may be used for immunoaffinity purification of antisera or IgG fractions by adsorbing the non-specific antibodies against host bacteria proteins, and leaving the specific antibody almost without change in activity and specificity.

Binding Capacity

1 ml of adsorbent reduces significantly the titer of antibodies directed against *E. coli* proteins from 1 ml crude antiserum or approx. 10 mg of an IgG fraction raised against a recombinant antigen prepared in *E. coli* (strains TG-1, XL-1 or DH-57).

In order to obtain best results, it is recommended that each user determine the optimal working dilution for individual applications by titration assay.

Storage

For continuous use, store at 2-8 °C. **Do Not Freeze.**

Reference

1. De Wet, J. et al., DNA, **3**, 437 (1984).

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