

**Anti Substance P Serum**

Cat. No. Y150 Lot No. 240471110

**Description:** This antiserum was raised in a rabbit by immunization with a bovine serum albumin (BSA) conjugate of synthetic substance P peptide. The product vial contains 50  $\mu$ L of the titled antiserum obtained by lyophilizing its 0.001 M phosphate buffer (pH 7.0, 0.5mL) solution. It can be used for immunoassay, immunohistochemistry or any other immunoreaction with substance P.

**Immunogen:** Synthetic substance P-BSA conjugate

**Host:** Rabbit

**Amino Acid Sequence of Substance P<sup>1)</sup>:** RPKPQFFGLM-NH<sub>2</sub>

**Product Form:** Lyophilized unpurified serum

**Size:** 50  $\mu$ L

**Reconstitution:** Reconstitute the product with 0.5mL of 0.01M PBS (pH 7.0) to make a 10 fold diluted stock solution. If it is stored in a refrigerator, add moderate antiseptic to the solution (e.g. NaN<sub>3</sub> 0.1%).

**Storage:** The product will be stable for over one year if it be stored at -20°C to -80°C until opened. Upon reconstitution, the antiserum solution must be stored at 2°C to 8°C and used within one month. Repeated freezing-thawing should be avoided.

**Suggested Working Dilution Range:** 1:8,500 (final dilution~1:60,000) for radioimmunoassay; 1: 1,000-4,000 for immunohistochemistry (frozen or paraffin sections). Optimal dilution should be determined by each laboratory for each application.

**Specificity** (based on radioimmunoassay): substance P 100%, substance P (6-10) 20%, substance P (4-10) 0.5%, neurokinin A 1.0%

**Positive Control** (immunohistochemistry): Rat colon

**Species Tested:** Human, dog, quail, guinea pig, rat<sup>2,3,4,5,6)</sup>

**REFERENCES:**

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- 4) T. Uchida, N. Yanaihara et al., Occurrence and projections of three subclasses of met-enkephalin-arg<sup>6</sup>-gly<sup>7</sup>-leu<sup>8</sup> neurons in the guinea-pig duodenum: immunoelectron microscopic study on the co-storage of met-enkephalin-arg<sup>6</sup>-gly<sup>7</sup>-leu<sup>8</sup> with substance P or PHI (1-15). *Biomedical Research* 6: 415-422, 1985
- 5) Y. Tsutsumi, Immunohistochemical analysis of neuroendocrine substances in nonneoplastic lung and in neuroendocrine lung tumors. In: *Endocrine Pathology Update* (Eds. J. Lechago and T. Kameya) Field & Wood Philadelphia I: 189-213, 1990
- 6) M. Yazawa, N. Yanaihara et al., Immunohistochemical demonstrations of peptide histidine methionine- and substance P-immunoreactive nerves in endoscopically biopsied rectal mucosa. *The Autonomic Nervous System* 27: 130-136, 1990

**FOR RESEARCH LABORATORY USE ONLY**  
DO NOT USE ORGANIC SOLVENTS FOR DISSOLVING ANTISERUM



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