Synaptophysin

ANTISERUM: Dako (M0776). Mouse monoclonal antibody. Clone SY776. Isotype: IgG1k

IMMUNOGEN: Presynaptic vesicles from bovine brain.

SPECIFICITY/REACTIVITY ACCORDING TO MANUFACTURER:

  The Dako antibody is directed against a 38 kDa protein present in the neuronal synaptic vesicle membrane. The protein is a component of the classical. Locally recycled small synaptic vesicle present in almost all neurons. The antibody shows broad interspecies cross-reactivity, reacting with synaptophysin I neuronal presynaptic vesicles (in brain, spinal cord, retina neuromuscular junctions, small vesicles of adrenal medulla and pancreatic islets) of human, bovine, rat or mouse origin.

  Normal tissues: neuroendocrine cells of the human adrenal medulla, carotid body, skin, pituitary, thyroid, lung, pancreas and gastrointestinal mucosa are labeled. Neurons in the brain, spinal cord and retina are also labeled by this antibody. Synaptophysin immunoreactivity has also been found in guinea pig heart.

  Tumor cells: The antibody reacts with a wide spectrum of neuroendocrine neoplasms of neural type including neuroblastomas, ganglioneuroblastomas, ganglioneuromas, pheochromocytoma, chromaffin and non-chromaffin paragangliomas. The antibody also labels neuroendocrine carcinomas of the bronchopulmonary and gastrointestinal tracts and neuroendocrine carcinomas of the skin.

STAINING PROCEDURE ACCORDING TO THE MANUFACTURER:

  Formalin-fixed, paraffin-embedded tissue sections: Heat-based antigen retrieval is mandatory. Immunoperoxidase or alkaline phosphatase methods are suitable. Suggested dilution for LSAB methods is 1/10-1/20. Excessive fixation in buffered formalin can be deleterious to synaptophysin reactivity.

  Frozen sections or cell smears: It can be used in acetone-fixed samples. APAAP is the method recommended for cell smears. Dilution: 1/10-1/20.

WORKING DILUTION: Steamer at 1/50. 30 min. RT.

METHOD: LSAB 2-PO. 30 min. RT.

CELLS/TISSUES STAINED (CANINE UNLESS SPECIFIED):

  Pancreas: Many islet cells have diffuse cytoplasmic reaction. Sustentacular cell sin pancreatic ganglion are strongly positive. Exocrine pancreas or other tissues in the pancreas are negative.

REFERENCES:


