



Anti-L-DOPA monoclonal antibody (DMAB4563)

This product is for research use only and is not intended for diagnostic use.

PRODUCT INFORMATION

Specificity Using a conjugate L-DOPA-(Pc), antibody specificity was performed with an ELISA test by

competition experiments with the following compounds:

Compound Cross-reactivity ratio (a)

L-DOPA-G-(Pc) 1

Dopamine-G-(Pc) 1/>50,000

Noradre

Immunogen Synthetic L-DOPA conjugated to protein carrier (Pc)

Isotype IgG1

Source/Host Mouse

Species Reactivity N/A

Conjugate Unconjugated

Applications Immunocytochemistry

Size $100 \mu l$

Preservative None

Storage Store at -20°C. Avoid multiple freeze/thaw cycles.

BACKGROUND

Introduction L Dopa is anintermediate in dopamine biosynthesis. Clinically, L Dopa is used in

themanagement of Parkinson"s disease. It is used as a prodrug to increasedopamine levels

45-1 Ramsey Road, Shirley, NY 11967, USA

Email:info@creative-diagnostics.com

Tel: 1-631-624-4882 Fax: 1-631-938-8221

since it is able to cross the blood-brain barrier whereasdopamine itself cannot. Once L Dopa has entered the central nervous system(CNS), it is metabolised to dopamine by aromatic L amino acid decarboxylase. This also occurs in the peripheral tissues, causing adverse effects anddecreasing the available dopamine to the CNS, so it is standard practice toco administer a peripheral DOPA decarboxylase inhibitor and often acatechol-O-methyl transferase (COMT) inhibitor.

Keywords

3 4 dihydroxy L phenylalanine; L dihydroxyphenylalanine; Levodopa; BETA-(3,4-DIHYDROXYPHENYL)-L-ALANINE; HYDROXYTYROSINE; H-PHE(3,4-DI-HYDROXY)-OH; H-PHE(3,4-DI-OH)-OH; H-TYR(3-HYDROXY)-OH; L-BETA-(3,4-DIHYDROXYPHENYL)ALANINE; L-DOPA; L-DOPA, L-3-HYDROXYTYROSINE; LEVODOPA; L-3-(3,4-DIHYDROXYPHENYL)ALANINE; L-3,4-DIHYDROXYPHENYLALANINE; L-3-HYDROXYTYROSINE; L Dopa