

Butyrylcholinesterase Inhibitor Activity Assay kit

Butyrylcholinesterase (BchE, EC3.1.1.8), also known as plasma cholinesterase, pseudocholinesterase, is a serine hydrolase that is synthesized by the liver and enters the blood and is present in almost all animal tissues. Compared with acetylcholinesterase (AChE), BchE can effectively hydrolyze larger choline esters, such as butyrylcholine and benzoylcholine, and can remove the toxic effects of nerve agents such as organophosphorus pesticides and carbamate pesticides. Studies have shown that BchE can be used as an important target for the treatment of Alzheimer's disease, and BchE inhibitors are used to improve memory loss and cognitive dysfunction in Alzheimer's patients. BchE catalyzes the hydrolysis of butyrylcholine to choline, and the reaction of choline with dithio-nitrobenzoic acid (DTNB) to produce 5-merhydryl-nitrobenzoic acid (TNB). BchE inhibitors reduce the hydrolysis of butyrylcholine by inhibiting BchE activity. TNB has an absorption peak at 412nm, and the BchE inhibitor activity can be calculated by measuring the change in absorbance at 412nm.

Catalog No.	250598
Size	50 Assays / 100 Assays
Product Category	Colorimetric Assay
Detection Method	Spectrophotometry / Micro-Plate Reader
Storage/Stability	-20°C/6 months
Shipping	Gel Packs