

California Bioscience

Product Datasheet

Product Name	Gamma-Synuclein Human Recombinant
Cata No	CB5001016
Source	Escherichia Coli.
Synonyms	Gamma-synuclein, Persyn, Breast cancer-specific gene 1 protein, Synoretin, SR, SNCG, BCSG1, PERSYN, PRSN, g-Synuclein.

Description

g-synuclein(Originally known as a breast cancer specific gene product, BCSG1) is an acidic neuronal protein of 127 amino acids. Gamma-Synuclein is a member of the Synuclein protein family, which is believed to be involved in the pathogenesis of neurodegenerative diseases. High levels of Gamma-Synuclein have been found in advanced breast carcinomas suggesting a correlation between overexpression of SNCG and breast tumor development. Synuclein-Gamma is found mostly in the peripheral nervous system (in primary sensory neurons, sympathetic neurons, and motor neurons) and retina. SNCG is also identified in the brain, ovarian tumors, and in the olfactory epithelium. SNCG expression in breast tumors is a marker for tumor progression. A modification in the expression of gamma-synuclein has been detected in the retina of Alzheimer's patients.

g-Synuclein Human Recombinant produced in E.Coli is a single,non-glycosylated polypeptide chain containing 127 amino acids and having a molecular mass of 13,300 Dalton.

The protein coding region of g-synuclein was amplified by RT-PCR and cloned into an *E.coli* expression vector. g-synuclein was overexpressed in *E. coli* and purified to apparent homogeneity by taking advantage of the thermosolubility of the protein and by using conventional column chromatography techniques.

Physical Appearance

Sterile filtered colorless solution.

Purity

Greater than 95.0% as determined by: (a) Analysis by RP-HPLC. (b) Analysis by SDS-PAGE.

Formulation

The protein (1mg/ml) contains 20mM Tris-HCl buffer (pH 7.5), 0.1M NaCl and 1mM MgCl₂.

Stability

Store at 4°C if entire vial will be used within 2-4 weeks.

Store, frozen at -20° for longer periods of time. For long term storage it is recommended to add a carrier protein (0.1% HSA or BSA).

Avoid multiple freeze-thaw cycles.

Sequence

mdvfkkgfsi akegvvgave ktkqgvteaa ektkegvmyv gaktkenvvqsvtsvaektk eqanavseav vssvntvatk tveeaeniav tsgvvrkedl rpsapqqegv askekeevae eaqsggd