



-AMYLASE from *Bacillus* sp. (Lot 85003)

E-BCBAM

06/03

PROPERTIES

1. ELECTROPHORETIC PURITY

- Single major protein band on SDS-gel electrophoresis (MW=59,250)
- Single major band (pI = 7.3); minor band pI = 7.0.

2. SPECIFIC ACTIVITY AND LEVEL OF OTHER ACTIVITIES

All activities are measured at pH 6.2 and 40°C.

-Amylase (starch, 10mg/ml) 2220 U/mg

(One Unit is defined as the amount of enzyme required to release one μ mole of maltose reducing-sugar equivalents per minute from soluble starch under the defined assay conditions.)

-Amylase (assayed on blocked p-NP-maltoheptaoside and converted to units on starch)
< 0.0001 U/mg.

3. PHYSICOCHEMICAL PROPERTIES

pH Optima 7.2 (starch).....6.5 (PNPG5)

With starch as substrate, half-maximal activities are at pH 5.8 and pH 8.2.

4. STORAGE CONDITIONS

The enzyme is supplied as an ammonium sulphate suspension in 0.02% sodium azide and should be stored at -20°C or 4°C. It should be prepared and diluted in a buffer containing BSA (1.0mg/ml). In this state it is stable to repeated freeze/thaw cycles. The enzyme is stable as an ammonium sulphate suspension at room temperature for periods of at least 6 months, and at -20°C for periods of at least 2 years.