

## β-AMYLASE (Barley) Powder (Lot 220602)

**Non-recombinant**

**E-BARBP-2G (20 kU/g on starch)**

**08/22**

EC: 3.2.1.2

Synonyms: beta-amylase; 4-alpha-D-glucan maltohydrolase

CAZy Family: GH14

CAS: 9000-91-3

**PROPERTIES**

**1. ELECTROPHORETIC PURITY:**

Before addition of BSA this enzymes appears as:

- Single band on SDS-gel electrophoresis (MW = 58,300)
- Two major bands on isoelectric focusing (pI's 5.4 & 5.7); minor band at pI 5.0
- Prepared from a crystalline enzyme

**2. ACTIVITY:**

Substrate	Activity (U/g)
Betamyl-3	500 U/g
Starch (10 mg/mL, pH 6.0, 40°C)	20,000 U/g

**3. CONTAMINANTS: %**

α-Amylase	< 0.005
α-Glucosidase (on maltose)	< 0.005

**4. PHYSICOCHEMICAL PROPERTIES:**

pH Optima:	6.0
pH Stability:	4.5-8.0
Temperature Optima:	60°C
Temperature Stability:	< 60°C

**5. STORAGE CONDITIONS:**

The enzyme is supplied as a powder freeze-dried in the presence of BSA, and should be stored below -10°C.

The enzyme, as supplied (in the presence of BSA) has an activity of 20,000 International Units per gram (on starch substrate, as above); (500 Betamyl-3 Units/g).

This activity is equal to 2,000° Lintner. **This enzyme is routinely used in AACC and ASBC methods to make β-Limit Dextrin for α-amylase assay procedures.**