D-GLUTAMATE-PYRUVATE TRANSAMINASE from *B. subtilis* (Lot 110603b)

Recombinant

E-GPTBS **07/15**

(EC 2.6.1.21) D-amino-acid transaminase; D-alanine:2-oxoglutarate aminotransferase

PROPERTIES

1. ELECTROPHORETIC PURITY:

- Single band on SDS-gel electrophoresis (MW ~ 33,346)
- Single major band on isoelectric focusing (pI ~ 5.7)

2. SPECIFIC ACTIVITY:

66 U/mg protein at pH 7.5 and 25°C.

One Unit of D-glutamate-pyruvate transaminase (D-GPT) is defined as the amount of enzyme required to produce one µmole of NAD^+ from NADH under the following assay conditions:

Potassium phosphate buffer, pH 7.5	45.3 mM
DL-Alanine	987 mM
α-Ketoglutaric acid	12.4 mM
NADH	0.21 mM
L-Lactate dehydrogenase	6.0 U/mL

3. OTHER ACTIVITIES (as a percentage of D-GPT activity):

Enzyme Measured	Substrate	Activity, %
D-Glutamate-pyruvate transaminase	D-alanine	100
NADH oxidase	NADH	< 0.002

4. PHYSICOCHEMICAL PROPERTIES:

Recommended conditions of use are at pH 7.5 and up to 25°C.

5. STORAGE AND USE CONDITIONS/RECOMMENDATIONS:

The enzyme is supplied as an ammonium sulphate suspension at 2,000 U/mL and should be stored at 4°C. **Swirl to mix the enzyme suspension immediately prior to use.**