

α -L-ARABINOFURANOSIDASE from A. niger (Lot 140301a)

E-AFASE 04/15

(EC 3.2.1.55) alpha-L-arabinofuranoside arabinofuranohydrolase CAZy: GH Family 51

PROPERTIES

I. ELECTROPHORETIC PURITY:

- Single major band on SDS-gel electrophoresis (MW = 62,000)
- Single major band on isoelectric focusing (pl < 3.0)

2. SPECIFIC ACTIVITY:

Substrate	Specific Activity (U/mg protein)
p-Nitrophenyl-α-arabinofuranoside (5 mM, pH 4, 40°C)	32.0
I,5-α-L-Arabinotriitol (5 mM, pH 4, 40°C)	7.1
Sugar-beet arabinan (5 mg/mL, pH 4, 40°C)	12.6
Wheat flour Arabinoxylan (5 mg/mL, pH 4, 40°C)	0.7
Debranched Sugar-beet arabinan (5 mg/mL, pH 4, 40°C)	0.4

Protein was determined with the Bio Rad Dye Binding procedure (Bradford) with BSA as standard.

3. CONTAMINATION WITH OTHER ACTIVITIES (%):

endo-Arabinanase	< 0.001
β-Xylanase	< 0.01

4. STABILITY:

- (a) pH Stability: Stable at room temperature for 20 hr at pH 4.0 to 8.0.
- (b) Temperature Stability: Stable for 20 hr at pH 4.0 and temperatures up to 50°C.

The enzyme is supplied in 3.2 M ammonium sulphate containing 0.02% sodium azide and should be stored at 4°C. On dissolution in buffer, it should be stored at -20°C. It is stable to repeated freeze/thaw cycles. On lyophilisation in the absence of salt, it can not be completely redissolved.