

CZ0856 UG EN V2302

# Δ-4,5-Unsaturated β-glucuronyl hydrolase 88A, *Bacteroides* thetaiotaomicron

# **BtUgl88A (GH88)**

Catalogue number Presentation

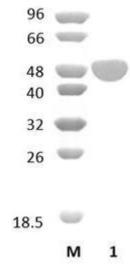
CZ08561 1 mg CZ08562 3 x 1 mg

#### **Description**

 $\Delta$ -4,5-Unsaturated  $\beta$ -glucuronyl hydrolase 88A (BtUgl88A), assigned the E.C. number 3.2.1.-, is a derivative of Bacteroides thetaiotaomicron. It is an enzyme that cleaves the glycosidic linkage between  $\Delta$ -4,5-unsaturated uronic acid and GlcN/GlcNAc disaccharides. The recombinant BtUgl88A, purified from Escherichia coli, is a single-domain Glycoside Hydrolase family 88 (GH88) enzyme (see more details at  $\underline{www.cazy.org}$ ). The protein is supplied in a solution containing 35 mM NaHepes buffer (pH 7.5), 750 mM NaCl, 200 mM Imidazole, 3.5 mM CaCl<sub>2</sub>, and 25% (v/v) glycerol, at a concentration of 1 mg/mL. Bulk quantities of this product can be made available upon request. To place an order, simply visit our website. We offer fast and secure shipping worldwide.

#### **Electrophoretic Purity**

The molecular integrity and purity of BtUgl88A (GH88) were evaluated using sodium dodecyl sulfate-polyacrylamide gel electrophoresis (SDS-PAGE), followed by BlueSafe staining (MB15201) (Figure 1).



**Figure 1**. SDS-PAGE analysis of *Bt*Ugl88A (GH88) was conducted in (Lane 1), employing a 14% polyacrylamide gel. The enzyme exhibits a band corresponding to a molecular weight of approximately 49,04 kDa. Lane M contains a Protein Marker for reference.

## Storage temperature

The protein should be stored at -30°C to -15°C in a constant temperature freezer. The protein will remain stable till the expiry date if stored as specified.

### **Substrate specificity**

BtUgl88A (GH88) hydrolyses UA-GlcNS, UA-GlcNAc6S and UA-GlcNAc.

#### Temperature and pH optima

The pH optimum for enzymatic activity is 6.5 while temperature optimum is 37 °C.

#### **Enzyme activity**

The substrate specificity and kinetic properties of *Bt*Ugl88A (GH88) are detailed in the referenced publication provided below. To perform enzyme assays and determine specific activity values, adhere to the methodology outlined in the cited paper(s).

#### Reference

Cartmell et al. (2017) Proc Natl Acad Sci U S A. 114(27):7037-7042.

#### **Customer Support**

Our dedicated customer support team is always ready to assist you with any questions or technical issues you may have. Reach us via email at info@nzytech.com.

# **Quality control assay**

Protein purity is determined to be ≥90%, as assessed by SDS-PAGE and subsequent BlueSafe staining (MB15201).

For life science research only. Not for use in diagnostic procedures.