

Recombinant Enzyme Product Specification Sheet

Cat. No.:	PRO-E0418	add this product to cart
LOT:	2009-0418	view all maltooligosyl trehalose trehalohydrolases
Activity:	Maltooligosyl trehalose trehalohydrolase	
Synonyms:	Malto-oligosyltrehalose trehalohydrolase; 4- α -D-((1- \rightarrow 4)- α -D-glucano)trehalose trehalohydrolase	
Nomenclature:	CAZy [GH13 subf10, glycoside hydrolase family 13 subfamily 10, member of clan GH-H]	
Source organism:	<i>Bradyrhizobium</i> sp. BTAi1	
Enzyme Commission No.:	3.2.1.141	
Activity:	-	NOTE: this product has been produced and is awaiting assay. It is thus currently available for purchase by the mg only. If you have a query, please contact us (technical@prozomix.com)
Specific activity:	-	
Purity:	> 95 % as judged by SDS-PAGE	
Form and storage:	Supplied in 3.2 M ammonium sulphate, store at 4°C (shipped at room temperature)	
pH optimum:	-	
Temperature optimum:	-	
[Protein]:	10 mg/mL	
Sequence length:	589 amino acids (view sequence)	
Accession No.:	A5EPZ9 , YP_001242149.1	
Molecular weight:	69634.7 Da	(theoretical)
	-	(observed by SDS-PAGE)
	-	(observed by mass spectrometry)
Biological function:	Hydrolysis of (1- \rightarrow 4)- α -D-glucosidic linkage in 4- α -D-((1- \rightarrow 4)- α -D-glucanosyl)(n) trehalose to yield trehalose and (1- \rightarrow 4)- α -D-glucan	
Potential application(s):	Carbohydrate research , fundamental research	
Comments:	-	
Usage:	Agitate vial sufficiently to fully homogenise enzyme precipitate before use	
Assay:	-	

Primary sequence:

MSGRQFGPRLSEHGTSFRLWAPAARRVDLVLDDGRREMQRDGGWYALDAPGIGAGTRYKFRIDDELDPDPSD
FQPEDVSGPSEVIDHCAYVWRAKDWGRPWQDAVFLESHVGTFTTEEGTYRAMDKLDHLVETGITALELMPLADFA
GRRNWGYDGVLLYAPDSVYGRPDDLRLALIDEAHLRGLMVFLDVVYNHFGPEGNYIARYAPTFFTDHTPWGSAID
YRRPEVRAFAIENALHHLTDRFDGLRFDVNHILSNEGEI PMLHELSSAAVGRLLVAQTGRHIHLVLENGDNRASML
DAAEPPRGKFRAQWNDDYHHVWHVMLTGETTGYYGDYQDNPRGGLARALASGFVYQGEQAAFVGGIRRGEPSGH
LAPGAFNFLQNHQIGNRVFGDRLEALAPPEGIAAALAVTLLAPTVPMLYMGEWGSKQPFPPFCDFQGLAHAV
RKGRRKEYEWAYAKYGDEVDPDPLDVETFRSAIIDWDARNEPPGRERLALVRDLLAVRHKVAPLLPGATFGAADVT
DEGLTAHWTMGDGSQRLRLANVSDKEIAGPSNDVNGTPIWGGTPGDRLPPWSVYWSIGG

Literature:

1. [Giraud *et al.* \(2007\) *Science* 316, 1307-1312](#)