-online.com genomics



1 Image	
Overview	
Quantity:	250 units
Application:	Polymerase Chain Reaction (PCR)
Product Details	
Purpose:	TransStart® Taq DNA Polymerase is a hot start Taq DNA polymerase containing Taq DNA
	polymerase and two proprietary DNA binding proteins.
Brand:	TransStart®
Specificity:	At room temperature, one binding protein binds to double-strand DNA template and another
	binding protein binds to primer. These unique formulations effectively neutralize the DNA
	polymerase activity at room temperature. Blocking proteins are released from templates and
	primers during the initial denaturation. This double blocking method has higher efficiency than
	antibody based, or chemically modified hot start PCR.
Characteristics:	- TransStart® Taq DNA Polymerase offers 18-fold fidelity as compared to EasyTaq® DNA
	Polymerase.
	- Extension rate is about 1-2 kb/min.
	- Template-independent "A" can be generated at the 3' end of the PCR product. PCR products
	can be directly cloned into pEASY®-T vectors.
	- Reduced nonspecific amplification and primer dimer formation.
	- Different from Taq antibody, no risk of contamination from mammalian DNA.
	- Different from chemical modification, long denaturing step is not needed.
	- Amplification of genomic DNA fragment up to 15 kb.
Components:	DNA Polymerase, 10X Taq Buffer, 10X GC Enhancer, 6X DNA Loading Buffer
Unit Definition:	One unit of TransStart® Taq DNA Polymerase incorporates 10 nmol of deoxyribonucleotide
	into acid-precipitable material in 30 minutes at 74°C.

Application Details	
Application Notes:	Complex templates, GC/AT-rich templates, Multiplex PCR, High yield PCR
Comment:	TransStart® Taq DNA Polymerase has passed the following quality control assays: functional absence of double- and single-strand endonuclease activity, >99% homogeneous measured by SDS-PAGE. Each batch of TransStart® Taq DNA Polymerase has been assayed for amplification efficiency to amplify p53 gene from 10 ng of human genomic DNA.
Restrictions:	For Research Use only
Handling	
Buffer:	Storage Buffer: 20 mM Tris-HCI (pH 8.0), 0.1 mM EDTA, 1 mM DTT, 100 mM KCI, 50 % glycerol, stabilizers 10xTransStart® Taq Buffer with 20 mM MgSO4: 500 mM Tris-HCI (pH 9.0), 200 mM (NH4)2SO4, 20 mM MgSO4, 10 % glycerol, others
Storage:	-20 °C
Storage Comment:	at -20°C for two years
Expiry Date:	24 months
Publications	
Product cited in:	Johnson, Drugan, Miller, Evans: "38" in: , Vol. 1363, Issue Nucleic acids research, pp. 28-39, (1991)

Images

Therma	l cycling	cond	ditio	ns				
94°C	2-5 mir	n						
94°C	30 sec	-						
50-60°C	30 sec	,	30-	35 cyc	les			
72°C	1-2 kb/mir)					
72°C	5-10 mir	1						
M1 _1	2 3	4	5	6	7	8	9	M2
=					and sold			1
11 1 1 1 100								
-								-
=								
-								
M1: 1Kb Plus DN	NA Ladder							
M2: Trans 15K DI								
	2: CCRD 0.5 kb; 4: Rhod 1.2 kb;							
	6: β-globin 3.0 kb;							
7: Rhod 4.17 kb	8: Factor IX 7.5 kb							
9: Serum albumi	n 12.4 kb Genomio DNA as tei							

Image 1.			