

Molecular Biology Grade TBS (Tris Buffered Saline)

Product	Con.	Cat#	Size
TBS (Tris Buffered Saline)	10X	IBS-BT005	1 L
	10X	IBS-BT005-1	5 L
	20X	IBS-BT008	1 L
	20X	IBS-BT008-1	5 L

TBS (Tris Buffered Saline) is used in Biochemical and molecular Biology applications.

Components : 1X TBS : 24.7 mM Tris, 2.7 mM potassium chloride, 137 mM sodium chloride, sterile solution

Form / Storage : Ready to use liquid. Store tightly capped at room temperature. Stable for a minimum 1 year from date of receipt at room temperature.

Introduction : Tris-buffered saline (abbreviated TBS) is a buffer used in some biochemical techniques to maintain the pH within a relatively narrow range. Tris (with HCl) has a slightly alkaline buffering capacity in the 7–9.2 range.

Tris has a pKa of 8.06 at 25 °C. The pKa declines approximately 0.03 units per degree Celsius rise in temperature.

This can lead to relatively dramatic pH shifts when there are shifts in solution temperature.

Application : TBS has many uses because it is isotonic and non-toxic. It can be used to dilute substances. Additives can be used to add function

1. Western blotting : 20X TBS buffer is a stock of TBS. TBS is used to make TBST, a wash buffer in western blot.

2. Immunohistochemical staining : TBS is used for immunohistochemical staining when background is high or when alkaline phosphatase conjugated antibodies are used. TBS is often used for diluting secondary antibodies or streptavidin-AP conjugate. TBS-Tween 20 is often used for washing steps.