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A Geno Technology, Inc. (USA) brand name

# FirstChoice™ Blocking Buffer

(Cat. #786-666, 786-667, 786-668, 786-669)



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## INTRODUCTION

FirstChoice™ Blocking Buffers contain a proprietary protein formulation that offers greater versatility and lack of cross-reactivity. This makes FirstChoice™ Blocking Buffers ideal as a first choice for optimization of new assays, system or when determining the optimal blocking buffer for elimination of non-specific binding sites in ELISA, blotting, immunohistochemistry and other applications. FirstChoice™ Blocking Buffers are compatible with antibodies and avidin/biotin based systems.

For users convenience FirstChoice™ Blocking Buffers are supplied in widely used TBS (Tris-buffered saline at pH 7.5) and PBS (phosphate-buffered saline at pH 7.5) buffers as well as in separate formulations containing Tween®-20.

## ITEM(S) SUPPLIED

Cat. #	Description	Size
786-666	<i>FirstChoice™ Blocking Buffer TBS (in Tris-buffered saline at pH 7.5)</i>	500ml
786-667	<i>FirstChoice™ Blocking Buffer TBST (in Tris-buffered saline at pH 7.5 with 0.05% Tween®-20)</i>	500ml
786-668	<i>FirstChoice™ Blocking Buffer PBS (in phosphate-buffered saline at pH 7.5)</i>	500ml
786-669	<i>FirstChoice™ Blocking Buffer PBST (in phosphate-buffered saline at pH 7.5 with 0.05% Tween®-20)</i>	500ml

## STORAGE CONDITIONS

Shipped at ambient conditions, upon arrival store at 4°C.

## IMPORTANT INFORMATION

- For optimal blocking, do NOT dilute the *FirstChoice™* Blocking Buffer.
- The efficacy of blocking agents varies from application to application, so we recommend empirical testing of blocking buffer and optimization of procedure to increase sensitivity and prevent nonspecific signal and cross-reaction between blocking agent and antibody.
- Use of detergent in blocking buffers is not required for all applications, however, addition of 0.05% Tween®-20 often improves blocking. Use only high quality ultra pure grade Tween®-20, we recommend our *Proteomic Grade* Tween®-20 solution (Cat. # DG011, DG012, DG511), which is purified to remove peroxide and carbonyl contaminants that may interfere in some applications. Do not add additional detergent to *FirstChoice™* Blocking Buffer in TBST (Cat. # 786-667) or *FirstChoice™* Blocking Buffer in PBST (Cat. # 786-669) as these have optimal Tween®-20.
- *FirstChoice™* Blocking Buffer may be used as stabilizer of proteins coated on ELISA plates for storage.

## PROCEDURE FOR BLOCKING WESTERN BLOTTING MEMBRANES

1. Following protein transfer to the membrane, transfer the membrane to a suitable size tray.

*NOTE: Protein-Free Blocking Buffer is suitable for PVDF and nitrocellulose membranes.*

2. Add enough FirstChoice™ Blocking Buffer to completely cover the membrane.
3. Incubate for 30-120 minutes at room temperature with agitation.
4. Discard blocking buffer and continue with downstream Western blotting steps.

*NOTE: For washing steps, use of femtoTBST™ (Cat.# 786-161) or femtoPBST™ (Cat. # 786-162) will minimize the washing out of immune-complexes and aid in the generation of cleaner backgrounds resulting in a higher signal to noise ratio, a common problem associated with classical TBST and PBST buffers used for washing.*

## PROCEDURE FOR BLOCKING ELISA PLATE

1. Apply sample (antigen or antibody) to the ELISA plates and incubate for 1-2 hours at room temperature.
2. Apply 300µl of FirstChoice™ Blocking Buffer to each well. Immediately empty the well by aspiration or inversion. Repeat this step twice more. Incubation is not required, however plates may be incubated without any detrimental effects.
3. Continue the downstream ELISA steps.

*NOTE: For washing steps, use of femtoTBST™ (Cat.# 786-161) or femtoPBST™ (Cat. # 786-162) will minimize the washing out of immune-complexes and aid in the generation of cleaner backgrounds resulting in a higher signal to noise ratio, a common problem associated with classical TBST and PBST buffers used for washing.*

4. For storage of coated plates, invert plates and allow plates to dry completely before sealing in a plastic bag with desiccant.

## RELATED PRODUCTS

Download our Western Blotting and Assay Development Handbooks



<http://info.gbiosciences.com/complete-western-blot-handbook--selection-guide><http://info.gbiosciences.com/complete-assay-development-handbook>

For other related products, visit our website at [www.GBiosciences.com](http://www.GBiosciences.com) or contact us.



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