

[Cat. No.] TA-1011-1

Introduction

Bioneer AccuNanoBead Amine Magnetic NanoBeads are uniform, silica-based paramagnetic beads coated with high density of primary amine functional groups on the surface. The beads are used to covalently conjugate primary epoxy or carboxy- containing ligands. The simple and efficient collection in magnetic fields, such as *MagListo™* Magnetic Separation Rack, allows for easy washing and removal of supernatant after coupling.

Features & Benefits

- Covalently couples with high efficiency
- Stable covalent bond with low levels of ligand leakage
- Produces reusable immunoaffinity matrices
- Low nonspecific binding
- Immobilize protein or peptide
- Application: Purification for Antibody Protein/Peptide

Components

Components	Amount
AccuNanoBead™ Amine Magnetic NanoBeads	0.5 g

* **Note:** For research use only. Not for use in diagnostic or therapeutic procedures.

Materials to be Prepared by User

Conjugation Buffer:	PBS buffer, pH 8.0 (adjust with NaOH) or 0.1 M sodium phosphate, pH 8.0
Blocking Buffer	0.5 M Tris-HCl, pH 8.0
Storage Buffer	PBS, pH 7.4 including 0.1 % Sodium azide and 0.02 % Tween 20

* **Note:** Buffer could be changed depending on user's needs.

Specifications

AccuNanoBead™ Amine Magnetic NanoBeads	
Composition	Amine Magnetic NanoBeads
Binding capacity	DMT Loading: ≥ 6 $\mu\text{mol/g}$ of beads
Size	Average 400 nm
Concentration	0.5 g(Solid)

Storage

Store at room temperature.

This product can be stable for 3 years at room temperature (25°C).

Expired date

Indicated on the label.

Precautions

- Do not vigorously vortex *AccuNanoBead™* Amine Magnetic NanoBeads.
- An exact protocol may need to be optimized by the user

Online Resources



Korean



English

Visit our **product page** for additional information and protocols

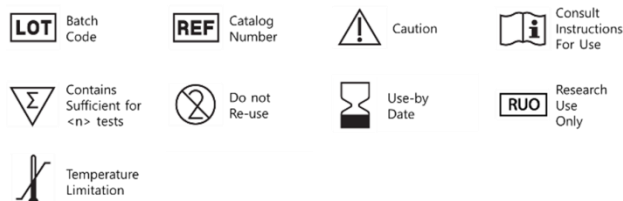
Ordering Information

Description	Cat. No.
AccuNanoBead™ Amine Magnetic NanoBeads	TA-1011-1

Notice

BIONEER corporation reserves the right to make corrections, modifications, improvements and other changes to its products, services, specifications or product descriptions at any time without notice.

Explanation of Symbols



Experimental Procedures (The protocols are scalable and can be optimized)

Steps	Procedure Details
<p>Coupling Method</p>	<ol style="list-style-type: none"> 1. Transfer Amine Magnetic Nanobeads to 1.5ml tube 2. Washing several time using the conjugation Buffer (PBS buffer, PH8.0). 3. Discard the washed buffer using a magnet 4. Add the protein with free thiol group or partially reduced antibody 1 to 10mg of protein per bead 1g. 5. React for 20 ~ 24 hours at room temperature using a rotator. (Depending on the stability of the protein, it can be carried out for 24 hours at 4 ° C. Reactivity is good at room temperature due to chemical reaction 6. Remove the reaction solution by using magnet, replace with blocking buffer (0.5 M Tris-HCl, pH 8.0 or 0.5 M Ethanolamine, pH 8.0) and react at 4°C for 12~16 hours 7. Remove the reaction solution by using magnet, washing well with PBS buffer.