

DADPS BIOTIN ALKYNE

SKU: CCT-1331

Description

Extraordinary strength of the streptavidin-biotin interaction allows for efficient capturing of even highly dilute targets; however, it makes recovery of proteins from affinity resins challenging. Conventional methods to elute biotinylated proteins from immobilized avidin include the following: (i) denaturation of streptavidin by boiling the resin in a denaturing buffer that may include high concentrations of chaotropic salts, (ii) trypsin digestion of proteins while they are bound to the resin, or (iii) elution of proteins with excess free biotin. These protocols can coelute contaminant proteins by releasing nonspecifically bound proteins and/or naturally biotinylated proteins concurrently with labeled proteins. In addition, some of these methods can cause elution of high levels of resin-based peptides along with the proteins of interest, resulting in further sample contamination.

DADPS (dialkoxydiphenylsilane) Biotin Alkyne probes eliminate a major limitation of the streptavidin-biotin affinity purification. This reagent contains a biotin moiety linked to an azide moiety through a spacer arm containing a cleavable DADPS linker. Captured biomolecules can be efficiently released under mild conditions (10% formic acid, 0.5 h) and the small (84 Da) molecular fragment left on the labeled protein following cleavage. These features make the DADPS probe especially attractive for use in biomolecular labeling and proteomic studies.

Specifications

For research use only. Not intended for animal or human therapeutic or diagnostic use.





Unit Size 1 mg, 5 mg, 25 mg

Molecular weight827.12Molecular weight84.12

Chemical composition C42H62N4O9SSi

CAS N/A

Solubility DMSO, DMF, THF, DCM, Chloroform

Appearance Oil to amorphous solid

Storage Conditions -20°C.

Shipping Conditions Ambient temperature

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