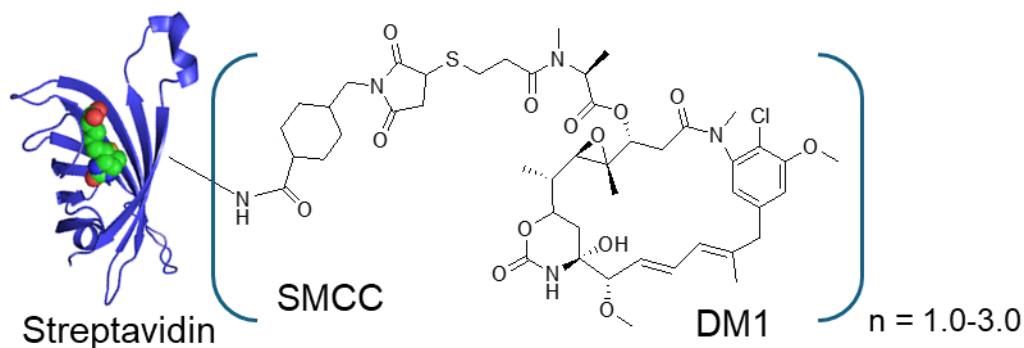


Catalog# BP-50163

Streptavidin-DM1

Description:

Streptavidin-DM1 is a Protein-drug conjugate (PDC) of Streptavidin with microtubule-inhibiting drug DM1 (Mertansine) conjugate through a linker. >95% Streptavidin were conjugated with DM1, the DPR (drug protein ratio) $n = 1-3$ drugs per protein. Streptavidin is a 52.8 kD tetrameric protein obtained from *Streptomyces avidinii*. It binds to biotin with a very high affinity and is one of the strongest interactions in nature with a dissociation constant of 10⁻¹⁴ mol/L. It is used in a wide range of applications including ELISA, flow cytometry, molecular biology, and bionanotechnology. DM1 (Mertansine) is a microtubule-inhibiting drug that is a synthetic derivative of maytansine and is used as a potential cancer treatment. DM1 can be attached to a monoclonal antibody or proteins with a linker to create a conjugate that is developed to overcome systemic toxicity associated with maytansine and to enhance tumor-specific delivery. DM1 is a strong antiproliferative chemotherapeutics toward over 60 types of cancer cell lines. This product is for research use only. The Streptavidin-DM1 has the following chemical structure:



Product Details	
Reactivity	Bind to Biotin
Source	<i>E. coli</i>
Type	Recombinant protein
Specific Activity	>15.0 U/mg protein
M.W.	52,800
Measurement	A280 of 0.1% solution: 3.2
Isoelectric point (pI)	6.8 to 7.5
Conjugate	Streptavidin conjugated with SMCC-DM1
DPR (Drug to Protein Ratio)	>95% protein conjugated, 1-3 drugs per protein
Form	Liquid
Concentration	1 mg/ml
Purification	Size Exclusive Column
Storage buffer	20 mM Sodium Borate, 6% Trehalose, pH8.0
Storage conditions	4°C for short time, -20°C or -80°C for long time.