STING, GST-Tag, His-Tag Recombinant

Product Information

Description:	Recombinant human STING (stimulator of interferon genes), encompassing amino acids 139-344. This construct contains an N-terminal GST tag followed by a Thrombin Cleavage Site and a C-terminal His-tag (6xHis). This protein was affinity purified.	
Background:	STING (stimulator of interferon genes), also known as TMEM173 (transmembrane protein 173), is a crucial protein in innate immunity. It is a membrane protein involved in the response to foreign DNA in hematopoietic lineage cells, such as NK and T cells, myeloid cells, and monocytes. It is also found in the retina, heart, and other tissues. STING gets activated by DNA sensors and triggers IFN (type I interferon) production, by stimulating TBK1, which then phosphorylates STAT6 (signal transducer and activator of transcription 6) or IRF3 (interferon regulatory factor 3). These in turn activate the expression of genes linked to immune responses. It can also function as a DNA sensor, by binding directly to the cyclic di-GMP. More recently STING's role in controlling ROS (reactive oxygen species) formation and that loss of STING reduces DNA damage have been identified. The development the STING agonist that be beneficial in combinatory cancer therapy.	
Species:	Human	
Construct:	STING (GST-Th-139-344-His)	
Concentration:	0.42 mg/ml	
Expression System:	Sf9	
Purity:	≥90%	
Format:	Aqueous buffer solution.	
Formulated In:	40 mM Tris-HCl, pH 8.0, 110 mM NaCl, 2.2 mM KCl, 0.04% Tween-20, 20% glycerol, and 175 mM Imidazole	
MW:	50 kDa	
Genbank Accession:	NM_198282	
Stability:	– At least 6 months at -80°C.	
Storage:	-80°C	
Instructions for Use:	Thaw on ice and gently mix prior to use. DO NOT VORTEX. Perform a quick spin before opening. Aliquot into small volumes and flash freeze for long term storage. Avoid multiple freeze/thaw cycles.	
Applications:	Useful for SDS-PAGE.	

Quality Control Data

4-20% SDS-PAGE Coomassie Staining

	1	2	
			– 250 kDa
			– 150 kDa
			– 100 kDa – 75 kDa
-	-		– 50 kDa – 37 kDa
			– 25 kDa – 20 kDa
			– 15 kDa – 10 kDa

