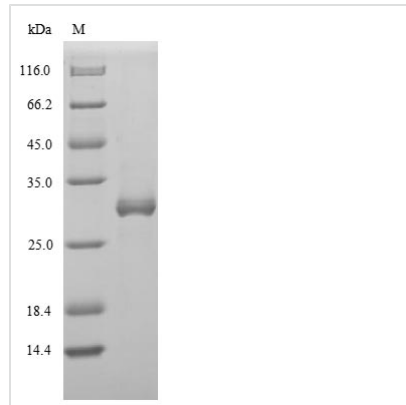




Recombinant Influenza A virus Non-structural protein 1 (NS)

Product Code	CSB-EP604972IER
Relevance	Prevents the establishment of the cellular antiviral state by inhibiting TRIM25-mediated DDX58 ubiquitination, which normally triggers the antiviral transduction signal that leads to the activation of type I IFN genes by transcription factors IRF3 and IRF7. Prevents human EIF2AK2/PKR activation, either by binding double-strand RNA, or by interacting directly with EIF2AK2/PKR. This function may be important at the very beginning of the infection, when NS1 is mainly present in the cytoplasm. Also binds poly(A) and U6 snRNA. Inhibits post-transcriptional processing of cellular pre-mRNA, by binding and inhibiting two cellular proteins that are required for the 3'-end processing of cellular pre-mRNAs: the 30KDA cleavage and polyadenylation specificity factor/CPSF4 and the poly(A)-binding protein 2/PABPN1. In turn, unprocessed 3' end pre-mRNAs accumulate in the host nucleus and are no longer exported to the cytoplasm. Cellular protein synthesis is thereby shut off very early after virus infection. Viral protein synthesis is not affected by the inhibition of the cellular 3' end processing machinery because the poly(A) tails of viral mRNAs are produced by the viral polymerase through a stuttering mechanism.
Abbreviation	Recombinant Influenza A virus Non-structural protein 1
Storage	The shelf life is related to many factors, storage state, buffer ingredients, storage temperature and the stability of the protein itself. Generally, the shelf life of liquid form is 6 months at -20°C/-80°C. The shelf life of lyophilized form is 12 months at -20°C/-80°C.
Uniprot No.	Q0HD54
Product Type	Recombinant Protein
Immunogen Species	Influenza A virus (strain A/Hickox/1940 H1N1)
Purity	≥ 85% as determined by SDS-PAGE.
Sequence	MDPNTVSSFQVDCFLWHVRKRVADQELGDAPFLDRLRRDQKSLKGRGSTLG LNIETATRVGKQIVERILKEESDEALKMTMASAPASRYLTDMTIEEMSRDWFML MPKQKVAGPLCIRMDQAVMDKSIILKANFSVIFDRLETILLRAFTEEGAIVGEIS PLPSLPGHTNEDVKNAIGVLIGGLEWNDNTVRVSKTLQRFAWRSSNENGGPP LTPKQKRKMARTIRSEVRRNKMVD
Research Area	Microbiology
Source	E.coli
Target Names	NS
Protein Names	NS1A
Expression Region	1-237aa



Notes	Repeated freezing and thawing is not recommended. Store working aliquots at 4°C for up to one week.
Tag Info	N-terminal 6xHis-tagged
Mol. Weight	30.8 kDa
Protein Length	Full Length
Image	 (Tris-Glycine gel) Discontinuous SDS-PAGE (reduced) with 5% enrichment gel and 15% separation gel.
Reconstitution	We recommend that this vial be briefly centrifuged prior to opening to bring the contents to the bottom. Please reconstitute protein in deionized sterile water to a concentration of 0.1-1.0 mg/mL. We recommend to add 5-50% of glycerol (final concentration) and aliquot for long-term storage at -20°C/-80°C. Our default final concentration of glycerol is 50%. Customers could use it as reference.
Shelf Life	The shelf life is related to many factors, storage state, buffer ingredients, storage temperature and the stability of the protein itself. Generally, the shelf life of liquid form is 6 months at -20°C/-80°C. The shelf life of lyophilized form is 12 months at -20°C/-80°C.