MRC PPU Reagents and Services

Standard Operating Procedure

Preparation of Influenza A Virus PA [1 - 716]

Enzyme description:- IAV PA [1 - 716]

Clone number:- DU 70818

Source:- Recombinant

Expression system:- *E.coli*

Tag:- N-terminal GST

Purification method:- GSH Agarose

Calculated molecular mass:-
Monoisotopic 109, 341.91 daltons
Average Mass 109, 412.52 daltons
[cysteines reduced, methionines have not been oxidised

Theoretical pI:- 5.46

Purity:- 80 %

Enzyme storage buffer:-
50 mM Tris-HCl pH 7.5, 270 mM Sucrose, 150 mM NaCl, 0.1 mM EGTA, 0.5 mM TCEP

Storage temperature:- -70 °C

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Clone Data Sheet

Influenza A Virus PA [1 – 716]

Protein IAV PA [1 - 716]

Clone number DU 70818

Species Influenza A virus (IAV) strain A/Puerto Rico/8/1934(H1N1) ('PR8')

Tags N-terminal GST

Bacterially expressed protein

MSPILGYWKIKGLVQPTRLLLEYLEEKYEEHLYERDEGDKWRNKKFELG
LEFPNLPYYIDGDVKLTQSMAIIRYIADKHNMLGGCPKERAEISMLEGA
VLDIRYGVSRIAYSKDFETLKVDFLSKLPEMLKMFEDRLCHKTYLNGDH
VTHPDFMLYDALDVVLYMDPMCLDAFPKLVCFKKRIEAIPQIDKYLKSS
KYIAWPLQGWQATFGGGDHPPKSDLEVLFQGPLGS**MEDFVRQCFNPMIV
ELAEKTMKEYGEDLKIETNKFAAICTHLEVCFMYSDFHFINEQGESIIV
ELGDPNALLKHRFEIIEGRDRTMAWTVVNSICNTTGAEKPKFLPDLYDY
KENRFIEIGVTRREVHIYYLEKANKIKSEKTHIHIFSFTGEEMATKADY
TLDEESRARIKTRLFTIRQEMASRGLWDSFRQSERGEETIEERFEITGT
MRKLADQSLPPNFSSLENFRAYVDGFEPNGYIEGKLSQMSKEVNARIEP
FLKTTPRPLRLPNGPPCSQRSKFLLMDALKLSIEDPSHEGEGIPLYDAI
KCMRTFFGWKEPNVVKPHEKGINPNYLLSWKQVLAELQDIENEEKIPKT
KNMKKTSQLKWALGENMAPEKVDFDDCKDVGDLKQYDSDEPELRSLASW
IQNEFNKACELTDSSWIELDEIGEDVAPIEHIASMRRNYFTSEVSHCRA
TEYIMKGVYINTALLNASCAAMDDFQLIPMISKCRTKEGRRKTNLYGFI
IKGRSHLRNDTDVVNFVSMEFSLTDPRLEPHKWEKYCVLEIGDMLIRSA
IGQVSRPMFLYVRTNGTSKIKMKWGMEMRRCLLQSLQQIESMIEAESSV
KEKDMTKEFFENKSETWPIGESPKGVEESSIGKVCRTLLAKSVFNSLYA
SPQLEGFSAESRKLLLIVQALRDNLEPGTFDLGGLYEAIEECLINDPWV
LLNASWFNSFLTHALS**

Native sequence Amino acids M1 – S716 (end residue) of IAV PA protein.
Residue M232 of the fusion protein is equivalent to M1 of the native enzyme. The GST tag is located at residues 1 – 220.

Protease cleavage PreScission (LEVLFQGP) residues 221 - 229