

Product datasheet for **AR09602PU-L**

surA (21-428, His-tag) Escherichia coli Protein

Product data:

Product Type:	Recombinant Proteins
Description:	surA (21-428, His-tag) e. coli recombinant protein, 0.5 mg
Species:	Escherichia coli
Expression Host:	E. coli
Expression cDNA Clone or AA Sequence:	<u>MGSSHHHHHH SSGLVPRGSH</u> MAPQWVKVA AVVNNGVVLE SDVDGLMQSV KLNAAQARQQ LPDDATLRHQ IMERLIMDQI ILQMGQKMGV KISDEQLDQA IANIAKQNNM TLDQMRSRLA YDGLNYNTYR NQIRKEMIIS EVRNNVRRR ITILPQEVES LAQQVGNQND ASTELNLSHI LIPLPENPTS DQVNEAESQA RAIVDQARNG ADFGKLAIAH SADQQALNGG QMGWGRIQEL PGIFAQALST AKKGDIVGPI RSGVGFHILK VNDLRGESKN ISVTEVHARH ILLKPSPIMT DEQARVKLEQ IAADIKSGKT TFAAAAKEFS QDPGSANQGG DLGWATPDIF DPAFRDALTR LNKQMSAPV HSSFGWHLIE LLDTRNVDKT DAAQKDRAYR MLMNRKFSEE AASWMQEQR A SAYVKILSN
Tag:	His-tag
Predicted MW:	47.3 kDa
Concentration:	lot specific
Purity:	>95% by SDS - PAGE
Buffer:	Presentation State: Purified State: Liquid purified protein Buffer System: 20 mM Tris-HCl Buffer (pH 8.0) containing 10% Glycerol
Bioactivity:	Specific: > 450 nmoles/min/mg, defined as the amount of enzyme that cleaves 1 umole of suc-AAFP-pNA per minute at 25°C in Tris-HCl pH 8.0 using chymotrypsin
Preparation:	Liquid purified protein
Applications:	Protocol: Activity Assay 1. Prepare 170 ul assay buffer into a suitable container and pre-chill on ice before use: The final concentrations are 200 mM Tris-HCl, pH 8.0, and 20nM chymotrypsin. 2. Add 10 ul of recombinant surA protein with 1 ug in assay buffer. 3. Mix by inversion and equilibrate to 1°C and monitor the A405nm until the value is constant using a spectrophotometer. 4. Add 20 ul pre-chilled 5 mM suc-AAFP-pNA. (Substrate was dissolved in TFE that contained 460mM LiCl to a concentration of 3 mM) 5. Record the increase in A405 nm for 30 minutes at 25°C.



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Protein Description:	Recombinant E.coli SurA protein, fused to His-tag at N-terminus, was expressed in E.coli and purified by using conventional chromatography.
Storage:	Store undiluted at 2-8°C for up to two weeks or (in aliquots) at -20°C or -70°C for longer. Avoid repeated freezing and thawing.
Stability:	Shelf life: one year from despatch.
Synonyms:	PPlase surA, Chaperone surA, Survival protein A
Summary:	SurA is a periplasmic peptidyl-prolyl isomerase (PPlase) and chaperone of Escherichia coli and other Gram-negative bacteria. This protein is a major factor in the biogenesis of beta-barrel outer membrane proteins (OMPs) and plays an integral role in cell envelope homeostasis and cell envelope functions. It is essential for the survival of E.coli in stationary phase and required for pilus biogenesis.
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Product images:

