

NFNB, 1-217aa, E.coli, His tag, E.coli

Cat.NO.: TP03151

3th Edition

Synonyms: dihydropteridine reductase, NAD(P)H-dependent, oxygen-insensitive, dprA, nfsB, nfsI, ntr

Description: NFNB, also known as NFSB, shows the ability to reduce quinines. This protein is an enzyme for activating prodrugs in antibody directed enzyme prodrug therapy. It also capable of reducing nitrofurazone, quinones and the anti-tumor agent CB1954 (5-(aziridin-1-yl)-2,4-dinitrobenzamide). The reduction of CB1954 results in the generation of cytotoxic species. Recombinant E.coli NFNB protein, fused to His-tag at N-terminus, was expressed in E.coli and purified by using conventional chromatography techniques.

Form: Liquid. In 20 mM Tris-HCl buffer (pH8.0) containing 50mM NaCl, 1mM DTT, 10% glycerol

Molecular Weight: 26.0 kDa (237aa) confirmed by MALDI-TOF

Sequences:

MGSSHHHHHSSGLVPRGSHMDIISVALKRHSTKAFDASKKLTPEQAEQIKTLLQYSPSSTNSQPWHFIVASTEELG
KARVAKSAAGNYVFNERKMLDASHVVVFCAKTAMDDVWLKLVVDQEDADGRFATPEAKAANDKGRKFFADMHRK
DLHDDAEWMAKQVYLVGNFLLGVAALGLDAVPIEGFDAAILDAEFGLKEKGYTSLVVVPGHHSVEDFNATLPKS
RLPQNITLTEV

Purity: > 95% by HPLC

Concentration: 1 mg/ml (determined by Bradford assay)

Endotoxin Level: <1.0 EU per 1 ug of protein (determined by LAL method)

Storage: Can be stored at +4°C short term (1-2 weeks). For long term storage, aliquot and store at -20°C or -70°C. Avoid repeated freezing and thawing cycles.