PRODUCT INFORMATION

Expression system E.coli

Domain 1-231aa

UniProt No. P16083

NCBI Accession No. AAH06096

Alternative Names

N-ribosyldihydronicotinamide:quinone reductase 2, NMOR2, NAD(P)H menadione oxidoreductase 2, Dioxininducible, NAD(P)H quinone dehydrogenase 2, Quinone reductase 2, QR2, DHQV, DIA6, NRH:quinone oxidoreductase 2

PRODUCT SPECIFICATION

Molecular Weight

28.1 kDa (251aa) confirmed by MALDI-TOF

Concentration

1mg/ml (determined by Bradford assay)

Formulation

Liquid in. 20mM Tris-HCl buffer (pH 8.0) containing 10% glycerol, 1mM DTT

Purity

> 95% by SDS-PAGE

Tag

His-Tag

Application SDS-PAGE

Storage Condition

Can be stored at +2C to +8C for 1 week. For long term storage, aliquot and store at -20C to -80C. Avoid repeated freezing and thawing cycles.

BACKGROUND

Description

NQO2 is a member of the NAD (P) H dehydrogenase (quinone). The enzyme apparently serves as a quinone reductase in connection with conjugation reactions of hydroquinones involved in detoxification pathways as well as in biosynthetic processes such as the vitamin K-dependent gamma-carboxylation of glutamate residues in prothrombin synthesis. It is flavoproteins that catalyze the metabolic detoxification of quinones and their



derivatives to hydroquinones. This detoxification process protects cells against quinone-induced oxidative stress, cytotoxicity and mutagenicity. Recombinant human NQO2 protein was expressed in E. coli and purified by using conventional chromatography techniques.

Amino acid Sequence

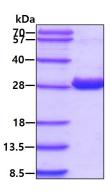
<MGSSHHHHHH SSGLVPRGSH> MAGKKVLIVY AHQEPKSFNG SLKNVAVDEL SRQGCTVTVS DLYAMNFEPR ATDKDITGTL SNPEVFNYGV ETHEAYKQRS LASDITDEQK KVREADLVIF QFPLYWFSVP AILKGWMDRV LCQGFAFDIP GFYDSGLLQG KLALLSVTTG GTAEMYTKTG VNGDSRYFLW PLQHGTLHFC GFKVLAPQIS FAPEIASEEE RKGMVAAWSQ RLQTIWKEEP IPCTAHWHFG Q

General References

Wu K., et al. (1997) Arch Biochem Biophys. 347(2):221-8. Jaiswal AK., et al. (1994) J Biol Chem. 269(20):14502-8.

DATA

SDS-PAGE



3ug by SDS-PAGE under reducing condition and visualized by coomassie blue stain.