

Fluorescent NADP/NADPH Detection Kit

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CATALOG #
AAA52794

PRODUCT SYNONYMS

Fluorescent NADP/NADPH; Fluorescent NADP/NADPH Detection Kit; Fluorescent NADP/NADPH Detection Kit 100 tests; Fluorescent NADP/NADPH detection kit

PRODUCT SPECIFICATIONS

Method of Analysis	Fluorescence plate reader
Preparation and Storage	Store contents as labeled Shipping: Blue Ice/Gel Packs

ADDITIONAL INFORMATION

Related Product Information for Fluorescent NADP/NADPH detection kit	Principle of the Assay: The Fluoro NADP/NADPH detection kit utilizes a non-fluorescent detection reagent, which is reduced in the presence of NADPH to produce its fluorescent analog and NADP. NADP is further converted to NADPH via an enzyme-coupled reaction. The enzymes in the reactions specifically react with NADP/NADPH and not with NAD/NADH.
Product Categories/Family for Fluorescent NADP/NADPH detection kit	Metabolic Assay
References	Kobayashi, H., et al. 2021. Chemical reversal of abnormalities in cells carrying mitochondrial DNA mutations. <i>Nat Chem Biol</i>, 335-343. Dougan, J., et al. 2019. Proteomics-Metabolomics Combined Approach Identifies Peroxidasin as a Protector against Metabolic and Oxidative Stress in Prostate Cancer. <i>Int J Mol Sci</i>, 3046. Petit, L., et al. 2018. Aerobic Glycolysis Is Essential for Normal Rod Function and Controls Secondary Cone Death in Retinitis Pigmentosa. <i>Cell Rep</i>, 2629-2642. Wu, H., et al. 2017. Polychlorinated biphenyls-153 induces metabolic dysfunction through activation of ROS/NF-κB signaling via downregulation of HNF1b. <i>Redox Biol</i>, 300-310. Chinchore, Y., et al. 2017. Glycolytic reliance promotes anabolism in photoreceptors. <i>Elife</i>, e25946. Ghanegolmohammadi, F., et al. 2017. Systematic analysis of Ca²⁺ homeostasis in <i>Saccharomyces cerevisiae</i> based on chemical-genetic interaction profiles. <i>Mol Biol Cell</i>, 3415-3427. Itsumi, M., et al. 2015. Idh1 protects murine hepatocytes from endotoxin-induced oxidative stress by regulating the intracellular NADP⁺/NADPH ratio. <i>Cell Death Differ</i>, 1837-45. Venkatesh, A., et al. 2015. Activated mTORC1 promotes long-term cone survival in retinitis pigmentosa mice. <i>J Clin Invest</i>, 1446-58. Wang, J.H., et al. 2014. Sigma S-Dependent Antioxidant Defense Protects Stationary-Phase <i>Escherichia coli</i> against the Bactericidal Antibiotic Gentamicin. <i>Antimicrob Agents Chemother</i>, 5964-75. Fridman, A., et al. 2013. Cell cycle regulation of purine synthesis by phosphoribosyl pyrophosphate and inorganic phosphate. <i>Biochem J</i>, 91-9. Sasaki, M., et al. 2012. D-2-hydroxyglutarate produced by mutant IDH1 perturbs collagen maturation and basement membrane function. <i>Genes Dev</i>, 2038-49. Nishida, K., et al. 2012. Induction of biogenic magnetization and redox control by a component of the target of rapamycin complex 1 signaling pathway. <i>PLoS Biol</i>, e1001269.

For Research Use Only. Not for use in diagnostic or therapeutic procedures. Small volumes of product may become entrapped in the seal of the vial during shipment and storage; if necessary, briefly centrifuge the vial on a tabletop centrifuge to dislodge any liquid in the cap.