www.neobiolab.com info@neobiolab.com 888.754.5670, +1 617.500.7103 United States 0800.088.5164, +44 020.8123.1558 United Kingdom

### **HPD Human**

Description: HPD produced in E.Coli is a single, non-glycosylated polypeptide chain containing 413 amino acids (1-393a.a.) and having a molecular mass of 47kDa.HPD is fused to a 20 amino acid His-tag at N-terminus & purified by proprietary chromatographic techniques.

Synonyms: 4HPPD, GLOD3, 4-HPPD, PPD, HPPDase, Glyoxalase Domain Containing 3, 4-HydroxyphenylpYruvate Dioxygenase.

Source: Escherichia Coli.

Physical Appearance: Sterile Filtered clear solution.

Amino Acid Sequence: MGSSHHHHHH SSGLVPRGSH MTTYSDKGAK PERGRFLHFH SVTFWVGNAK QAASFYCSKM GFEPLAYRGL ETGSREVVSH VIKQGKIVFV LSSALNPWNK EMGDHLVKHG DGVKDIAFEV EDCDYIVQKA RERGAKIMRE PWVEQDKFGK VKFAVLQTYG DTTHTLVEKM NYIGQFLPGY EAPAFMDPLL PKLPKCSLEM IDHIVGNQPD QEMVSASEWY LKNLQFHRFW SV

Purity: Greater than 90% as determined by SDS-PAGE.

#### Formulation:

The HPD protein solution (1mg/1ml) is formulated in 20mM Tris-HCl buffer (pH 8.0) 1mM DTT, 50mM NaCl and 20% glycerol.

## Usage:

NeoBiolabs products are furnished for LABORATORY RESEARCH USE ONLY. The product may not be used as drugs, agricultural or pesticidal products, food additives or household chemicals.

# Introduction:

4-Hydroxyphenylpyruvate Dioxygenase Isoform-1 is an Fe-containing enzyme, which catalyzes the second reaction in the catabolism of tyrosine the conversion of 4-hydroxyphenylpyruvate to homogentisate. Present as a homodimer, HPD uses zinc as a cofactor to catalyze the third step in the conversion of L-phenylalanine to fumarate and acetoacetic acid. Flaws in the gene encoding HPD result in tyrosinemia type 3 and hawkinsinuria, two inborn defects of metabolism which are related to a number of symptoms, like mental retardation and seizures and hair and urine abnormalities.

### Storage:

Store at 4°C if entire vial will be used within 2-4 weeks. Store, frozen at -20°C for longer periods of time. For long term storage it is recommended to add a carrier protein (0.1% HSA or BSA). Avoid multiple freeze-thaw cycles.

To place an order, please Click HERE.



Catalog #:ENPS-022

For research use only.



