

Product datasheet for TP302172L

OriGene Technologies, Inc.

9620 Medical Center Drive, Ste 200 Rockville, MD 20850, US Phone: +1-888-267-4436 https://www.origene.com techsupport@origene.com EU: info-de@origene.com CN: techsupport@origene.cn

Cytochrome P450 Reductase (POR) (NM_000941) Human Recombinant Protein

Product data:

Product Type: Recombinant Proteins

Description: Recombinant protein of human P450 (cytochrome) oxidoreductase (POR), 1 mg

Species: Human
Expression Host: HEK293T

Expression cDNA Clone >RC202172 protein sequence or AA Sequence: Red=Cloning site Green=Tags(s)

MINMGDSHVDTSSTVSEAVAEEVSLFSMTDMILFSLIVGLLTYWFLFRKKKEEVPEFTKIQTLTSSVRES SFVEKMKKTGRNIIVFYGSQTGTAEEFANRLSKDAHRYGMRGMSADPEEYDLADLSSLPEIDNALVVFCM ATYGEGDPTDNAQDFYDWLQETDVDLSGVKFAVFGLGNKTYEHFNAMGKYVDKRLEQLGAQRIFELGLG

D

DDGNLEEDFITWREQFWLAVCEHFGVEATGEESSIRQYELVVHTDIDAAKVYMGEMGRLKSYENQKPPFD AKNPFLAAVTTNRKLNQGTERHLMHLELDISDSKIRYESGDHVAVYPANDSALVNQLGKILGADLDVVMS LNNLDEESNKKHPFPCPTSYRTALTYYLDITNPPRTNVLYELAQYASEPSEQELLRKMASSSGEGKELYL SWVVEARRHILAILQDCPSLRPPIDHLCELLPRLQARYYSIASSSKVHPNSVHICAVVVEYETKAGRINK GVATNWLRAKEPVGENGGRALVPMFVRKSQFRLPFKATTPVIMVGPGTGVAPFIGFIQERAWLRQQGKE

V

 ${\sf GETLLYYGCRRSDEDYLYREELAQFHRDGALTQLNVAFSREQSHKVYVQHLLKQDREHLWKLIEGGAHIY}$

VCGDARNMARDVQNTFYDIVAELGAMEHAQAVDYIKKLMTKGRYSLDVWS

TRTRPLEQKLISEEDLAANDILDYKDDDDKV

Tag: C-Myc/DDK
Predicted MW: 76.9 kDa

Concentration: >0.05 μg/μL as determined by microplate BCA method

Purity: > 80% as determined by SDS-PAGE and Coomassie blue staining

Buffer: 25 mM Tris-HCl, 100 mM glycine, pH 7.3, 10% glycerol

Preparation: Recombinant protein was captured through anti-DDK affinity column followed by

conventional chromatography steps.

Note: For testing in cell culture applications, please filter before use. Note that you may experience

some loss of protein during the filtration process.





Storage: Store at -80°C.

Stability: Stable for 12 months from the date of receipt of the product under proper storage and

handling conditions. Avoid repeated freeze-thaw cycles.

RefSeq: NP 000932

 Locus ID:
 5447

 UniProt ID:
 P16435

 RefSeq Size:
 2509

 Cytogenetics:
 7q11.23

 RefSeq ORF:
 2040

Synonyms: CPR; CYPOR; P450R

Summary: This gene encodes an endoplasmic reticulum membrane oxidoreductase that is essential for

multiple metabolic processes, including reactions catalyzed by cytochrome P450 proteins for metabolism of steroid hormones, drugs and xenobiotics. The encoded protein has a flavin adenine dinucleotide (FAD)-binding domain and a flavodoxin-like domain which bind two cofactors, FAD and FMN, that allow it to donate electrons directly from NADPH to all

microsomal P450 enzymes. Mutations in this gene cause a complex set of disorders, including

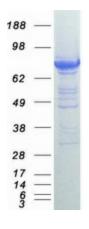
apparent combined P450C17 and P450C21 deficiency, amenorrhea and disordered

steroidogenesis, congenital adrenal hyperplasia and Antley-Bixler syndrome, that resemble those caused by defects in steroid metabolizing enzymes such as aromatase, 21-hydroxylase,

and 17 alpha-hydroxylase. [provided by RefSeq, Aug 2020]

Protein Families: Druggable Genome, P450, Transmembrane

Product images:



Coomassie blue staining of purified POR protein (Cat# [TP302172]). The protein was produced from HEK293T cells transfected with POR cDNA clone (Cat# [RC202172]) using MegaTran 2.0 (Cat# [TT210002]).