

Product Information

MemDX™ Membrane Protein Human CYP1A2 (Cytochrome P450 family 1 subfamily A member 2) for Antibody Discovery

Cat. No.: MP1090J

This product is for research use only and is not intended for diagnostic use.

This product is a 58.2 kDa Human CYP1A2 membrane protein expressed in HEK293T. The protein is for research use only and is not approved for use in humans or in clinical diagnosis.

Product Specifications

Host Species

Human

Target Protein

CYP1A2

Protein Length

Full-length

Protein Class

Druggable Genome, P450, Transmembrane

Molecular Weight

58.2 kDa

Sequence

MALSQSVPFSATELLLASAIFCLVFWVLKGLRPRVPKGLKSPPEPWGWPLLGHVLTLGKNPHLALSRMSQ RYGDVLQIRIGSTPVLVLSRLDTIRQALVRQGDDFKGRPDLYTSTLITDGQSLTFSTDSGPVWAARRRLA QNALNTFSIASDPASSSSCYLEEHVSKEAKALISRLQELMAGPGHFDPYNQVVVSVANVIGAMCFGQHFP ESSDEMLSLVKNTHEFVETASSGNPLDFFPILRYLPNPALQRFKAFNQRFLWFLQKTVQEHYQDFDKNSV RDITGALFKHSKKGPRASGNLIPQEKIVNLVNDIFGAGFDTVTTAISWSLMYLVTKPEIQRKIQKELDTV IGRERRPRLSDRPQLPYLEAFILETFRHSSFLPFTIPHSTTRDTTLNGFYIPKKCCVFVNQWQVNHDPEL WEDPSEFRPERFLTADGTAINKPLSEKMMLFGMGKRRCIGEVLAKWEIFLFLAILLQQLEFSVPPGVKVD LTPIYGLTMKHARCEHVQARLRFSIN

Product Description

Expression Systems

HEK293T

Tag

C-Myc/DDK

Form

Liquid

Purification

Anti-DDK affinity column followed by conventional chromatography steps

Purity

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

Buffer

25 mM Tris.HCl, pH 7.3, 100 mM glycine, 10% glycerol

Storage

Store at +4°C for up to one week or several months at -80°C

Target

Target Protein

CYP1A2

Full Name

Cytochrome P450 family 1 subfamily A member 2

Introduction

This gene encodes a member of the cytochrome P450 superfamily of enzymes. The cytochrome P450 proteins are monoxygenases which catalyze many reactions involved in drug metabolism and synthesis of cholesterol, steroids and other lipids. The protein encoded by this gene localizes to the endoplasmic reticulum and its expression is induced by some polycyclic aromatic hydrocarbons (PAHs), some of which are found in cigarette smoke. The enzyme's endogenous substrate is unknown; however, it is able to metabolize some PAHs to carcinogenic intermediates. Other xenobiotic substrates for this enzyme include caffeine, aflatoxin B1, and acetaminophen. The transcript from this gene contains four Alu sequences flanked by direct repeats in the 3' untranslated region.

Alternative Names

CP12; CYPIA2; P3-450; P450(PA)

Gene ID

<u>1544</u>

UniProt ID

P05177