

# Product Information

## MemDX™ Membrane Protein Human CNGA1 (Cyclic nucleotide gated channel subunit alpha

### 1) Full Length

Cat. No.: **MPC1051K**

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

This product is a 79.5 kDa Human CNGA1 membrane protein expressed in HEK293. 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

CNGA1

#### Protein Length

Full length

#### Protein Class

Transporter; Ion channel

#### Molecular Weight

79.5 kDa

#### TMD

6

#### Sequence

MKLSMKNNIINTQQSFVTMPNVIVPDIEKEIRRMENGACSSFSEDDDSAS  
TSESEENENPHARGSFYSYKSLRKGGPSQREQYLPGAIALFNVNNSNKKDQ  
EPEEKKKKKKKEKSKSDDKNENKNDPEKKKKKKKDKEKKKKKEEKSKDKKEE  
EKKEVVVIDPSGNTYYNWLFCTLPVMYNWTMVIARACFDELQSDYLEYW  
LILDYVSDIVYLIDMFVTRTRTGYLEQGLLVKEELKLINKYKSNLQFKLDV  
LSLIPTDLLYFKLGWNYPEIRLNRLRFSRMFEFFQRTETRTNYPNIFRI  
SNLVMYIVIIHWNACVFYSISKAIGFGNDTWVYPDINDPEFGRLARKYV  
YSLYWSTLTTLTIGETPPPVRDSEYVFVVVDFLIGVLIFATIVGNIGSMI  
SNMNAARAEFQARIDAIKQYMHFRNVSKDMEKRVIKWFDYLTWNKKTVD  
KEVLKYLDPDKLRAEIAINVHLDTLKKVRIFADCEAGLLVELVLKLQPQVY  
SPGDYICKKGDIGREMYIIEGKLA VVADDGVTQFVVLSDGSYFGEISIL  
NIKGSKAGNRRTANIKSIGYSDLFCLSKDDLMEALTEYPAKTMLEEKGK  
QILMKDGLLDLNIANAGSDPKDLEEKVTRMEGSDVLLQTRFARILAEYES  
MQQKLKQRLTKVEKFLKPLIDTEFSSIEGPGAESGPIDST

### Product Description

## Expression Systems

HEK293

## Tag

Based on specific requirements

## Protein Format

Detergent or based on specific requirements

## Form

Liquid

## Storage

Aliquot and store at -20°C or lower. For long term storage, we recommend to store at -70°C or lower. Avoid freeze/thaw cycles.

## Target

### Target Protein

CNGA1

### Full Name

Cyclic nucleotide gated channel subunit alpha 1

### Introduction

The protein encoded by this gene is involved in phototransduction. Along with another protein, the encoded protein forms a cGMP-gated cation channel in the plasma membrane, allowing depolarization of rod photoreceptors. This represents the last step in the phototransduction pathway. Defects in this gene are a cause of retinitis pigmentosa autosomal recessive (ARRP) disease. Multiple transcript variants have been found for this gene.

### Alternative Names

CNGA1; CNCG; CNG1; RP49; CNCG1; CNG-1; RCNC1; RCNCa; RCNCalpha; cGMP-gated cation channel alpha-1; CNG channel alpha-1; cyclic nucleotide gated channel alpha 1; cyclic nucleotide-gated cation channel 1; cyclic nucleotide-gated channel, photoreceptor; interleukin-1 homologue; rod photoreceptor cGMP-gated channel subunit alpha; Cyclic nucleotide-gated channel, photoreceptor; Cyclic nucleotide gated channel subunit alpha 1

### Gene ID

[1259](#)

### UniProt ID

[P29973](#)