



[Go to Product page](#)

Datasheet for ABIN7538461

OPN5 Protein

Overview

Quantity:	50 µg
Target:	OPN5
Origin:	Human
Source:	Mammalian Cells
Protein Type:	Synthetic Nanodisc

Product Details

Purpose:	Human OPN5 full length protein-synthetic nanodisc
Characteristics:	Unlike other membrane scaffold protein (MSP) Nanodisc on the market, our synthetic Nanodisc can be prepared directly from the cells. The polymers used during this process have a dual function. It dissolves the cell membranes, like the detergent, and uses cellular phospholipids to form Nanodisc around the membrane proteins. The target protein embedded Nanodiscs can then be purified.

Target Details

Target:	OPN5
Alternative Name:	OPN5 (OPN5 Products)
Background:	Opsins are members of the guanine nucleotide-binding protein (G protein)-coupled receptor superfamily. This opsin gene is expressed in the eye, brain, testes, and spinal cord. This gene belongs to the seven-exon subfamily of mammalian opsin genes that includes peropsin (RRH) and retinal G protein coupled receptor (RGR). Like these other seven-exon opsin genes, this family member may encode a protein with photoisomerase activity. Alternative splicing results

Target Details

in multiple transcript variants. [provided by RefSeq, Jun 2010]

Molecular Weight: The human full length OPN5 protein has a MW of 39.7kDa

UniProt: [Q6U736](#)

Application Details

Comment: Advantages of Synthetic Nanodiscs:

- Highly purified membrane proteins
- High solubility in aqueous solutions
- High stability
- Proteins are in a native membrane environment and remain biologically active
- No detergent and can be used for cell-based assays
- No MSP backbone proteins

Limitations of Synthetic Nanodiscs:

- Intolerant to acids and high concentrations of divalent metal ions

Restrictions: For Research Use only

Handling

Format: Lyophilized

Buffer: Lyophilized from nanodisc solubilization buffer (20 mM Tris-HCl, 150 mM NaCl, pH 8.0).
Normally 5 % - 8 % trehalose is added as protectants before lyophilization.

Storage: -20 °C,-80 °C

Storage Comment: Store at -20°C to -80°C for 12 months in lyophilized form. After reconstitution, if not intended for use within a month, aliquot and store at -80°C (Avoid repeated freezing and thawing).
Lyophilized proteins are shipped at ambient temperature.

Expiry Date: 12 months