

**PRODUCT INFORMATION**

<b>Tag</b>	C-Flag Tag
<b>Target</b>	OPRD
<b>Synonyms</b>	DOP, DOR, DOR1, OPRD
<b>Description</b>	Human OPRD full length protein-synthetic nanodisc
<b>Delivery</b>	6~8weeks
<b>Uniprot ID</b>	P41143
<b>Expression Host</b>	HEK293
<b>Protein Families</b>	Transmembrane, Druggable Genome,
<b>Protein Pathways</b>	GPCRDB Class A Rhodopsin-like, Peptide GPCRs, Autoimmune & Inflammatory Response, G-Protein Coupled Receptors Signaling Pathway, Na <sup>2+</sup> /NF-AT Signaling Pathways,
<b>Molecular Weight</b>	The human full length OPRD protein has a MW of 40.4kDa
<b>Formulation &amp; Reconstitution</b>	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. Please see Certificate of Analysis for specific instructions. Do not use solvents with a pH below 6.5 or those containing high concentrations of divalent metal ions (greater than 5 mM) in subsequent experiments.
<b>Storage &amp; Shipping</b>	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.
<b>Background</b>	G-protein coupled receptor that functions as receptor for endogenous enkephalins and for a subset of other opioids. Ligand binding causes a conformation change that triggers signaling via guanine nucleotide-binding proteins (G proteins) and modulates the activity of down-stream effectors, such as adenylate cyclase. Signaling leads to the inhibition of adenylate cyclase activity. Inhibits neurotransmitter release by reducing calcium ion currents and increasing potassium ion conductance. Plays a role in the perception of pain and in opiate-mediated analgesia. Plays a role in developing analgesic tolerance to morphine.[UniProtKB/Swiss-Prot Function]
<b>Usage</b>	Research use only
<b>Conjugate</b>	Unconjugated

