Recombinant Human HIF1A Protein

Catalog Number: PDEH100740



Description Species Human Mol Mass 25.2 kDa Accession O16665 **Bio-activity** Not validated for activity **Properties** > 90% as determined by reducing SDS-PAGE. Purity Endotoxin < 10 EU/mg of the protein as determined by the LAL method Generally, lyophilized proteins are stable for up to 12 months when stored at -20 to -80 Storage °C. Reconstituted protein solution can be stored at 4-8°C for 2-7 days. Aliquots of reconstituted samples are stable at $< -20^{\circ}$ C for 3 months. This product is provided as lyophilized powder which is shipped with ice packs. Shipping Lyophilized from a 0.2 µm filtered solution in PBS with 5% Trehalose and 5% Formulation Mannitol. Reconstitution It is recommended that sterile water be added to the vial to prepare a stock solution of 0.5 mg/mL. Concentration is measured by UV-Vis.

Note: Centrifuge before opening to ensure complete recovery of vial contents.

Background

Functions as a master transcriptional regulator of the adaptive response to hypoxia.Under hypoxic conditions, activates the transcription of over 40 genes, including erythropoietin, glucose transporters, glycolytic enzymes, vascular endothelial growth factor, HILPDA, and other genes whose protein products increase oxygen delivery or facilitate metabolic adaptation to hypoxia.Plays an essential role in embryonic vascularization, tumor angiogenesis and pathophysiology of ischemic disease.Heterodimerizes with ARNT, heterodimer binds to core DNA sequence 5'-TACGT G-3' within the hypoxia response element (HRE) of target gene promoters.