

DESCRIPTION

Source	<i>Spodoptera frugiperda</i> , Sf 21 (baculovirus)-derived human VHL/ELOB/ELOC/CUL2/RBX1 Complex protein Met1 - Asp213 (VHL), Met1 - Gln118 (ELOB), Met1 - Cys112 (ELOC), Met1 - Ala 745 with a N-terminal 10-His tag Sumo tag (CUL2), Met1 - His108 (RBX1) Accession # P40337.2, Q15370.1, Q15369.1, Q13617.2, P62877.1
Predicted Molecular Mass	25 kDa (VHL), 13.1 kDa (ELOB), 12.8 kDa (ELOC), 93 kDa (CUL2), 12 kDa (RBX1)

SPECIFICATIONS

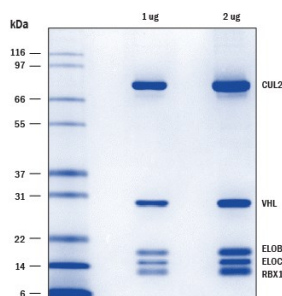
Activity	Typical protein concentration for use in vitro will depend on experimental conditions.
Purity	>90%, by SDS-PAGE under reducing conditions and visualized by Colloidal Coomassie® Blue stain.
Formulation	Supplied as a 0.2 µm filtered solution in HEPES, NaCl, DTT and Glycerol. See Certificate of Analysis for details.

PREPARATION AND STORAGE

Shipping	The product is shipped with dry ice or equivalent. Upon receipt, store it immediately at the temperature recommended below.
Stability & Storage	Use a manual defrost freezer and avoid repeated freeze-thaw cycles. <ul style="list-style-type: none"> • 6 months from date of receipt, -70 °C as supplied. • 3 months, -70 °C under sterile conditions after opening.

DATA

SDS-PAGE



Recombinant Human Elongin B/Elongin C/VHL/CUL2/RBX1
SDS-PAGE 1 µg and 2 µg per lane of Recombinant Human VHL/ELOB/ELOC/CUL2/RBX1 Complex (Catalog # E3-655) was resolved with SDS-PAGE under reducing conditions and visualized by colloidal Coomassie Blue staining, showing bands corresponding to the individual proteins of the complex.

BACKGROUND

VHL (von Hippel-Lindau disease tumor suppressor) is the substrate recognition subunit for an E3 ligase activity that ubiquitinates proteins containing hydroxyproline residues. Targets of VHL include HIF1α, β2 adrenergic receptor, ZHX2 and others. In VHL-box E3 Ubiquitin ligases, VHL is bound to a heterodimer complex composed of Elongin B (ELOB) and Elongin C (ELOC) through the "BC-box motif" found in many proteins in the VHL-box and SOCS-box protein families. ELOB/ELOC serves as an adapter between substrate recognition proteins and Cullin-2 (or Cullin-5) and RBX1 to form an active E3 ligase.

References:

1. Kamura T., *et al.* (1998) Genes & Dev. doi: 10.1101/gad.12.24.3872
2. Okumura F., *et al.* (2012) Front. Oncol. doi: 10.3389/fonc.2012.00010
3. Xie L., *et al.* (2009) Sci. Signaling doi: 10.1126/scisignal.2000444
4. Zhang J., *et al.* (2018) Science doi: 10.1126/science.aap8411