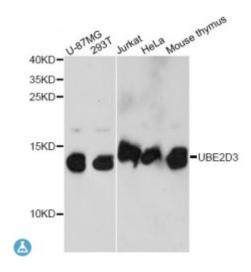


Anti-UBE2D3 Antibody



Description The modification of proteins with ubiquitin is an important cellular

mechanism for targeting abnormal or short-lived proteins for degradation. Ubiquitination involves at least three classes of enzymes: ubiquitinactivating enzymes, or E1s, ubiquitin-conjugating enzymes, or E2s, and ubiquitin-protein ligases, or E3s. This gene encodes a member of the E2 ubiquitin-conjugating enzyme family. This enzyme functions in the ubiquitination of the tumor-suppressor protein p53, which is induced by an

E3 ubiquitin-protein ligase.

Model STJ116847

Host Rabbit

Reactivity Human, Mouse

Applications WB

Immunogen A synthetic peptide corresponding to a sequence within amino acids 1-100 of

human UBE2D3 (NP_003331.1).

Gene ID <u>7323</u>

Gene Symbol <u>UBE2D3</u>

Dilution range WB 1:500 - 1:2000

Purification Affinity purification

Note For Research Use Only (RUO).

Protein Name Ubiquitin-conjugating enzyme E2 D3

Molecular Weight 16.687 kDa

Clonality Polyclonal

Unconjugated Conjugation

IgG Isotype

PBS with 0.02% sodium azide, 50% glycerol, pH7.3. **Formulation**

Storage Instruction Store at -20C. Avoid freeze / thaw cycles.

Database Links HGNC:12476OMIM:602963Reactome:R-HSA-1234176

Ubiquitin-conjugating enzyme E2 D3 **Alternative Names**

Function Accepts ubiquitin from the E1 complex and catalyzes its covalent attachment

to other proteins, In vitro catalyzes 'Lys-11'-, as well as 'Lys-48'-linked polyubiquitination, Cooperates with the E2 CDC34 and the SCF(FBXW11) E3 ligase complex for the polyubiquitination of NFKBIA leading to its subsequent proteasomal degradation, Acts as an initiator E2, priming the phosphorylated NFKBIA target at positions 'Lys-21' and/or 'Lys-22' with a monoubiquitin, Ubiquitin chain elongation is then performed by CDC34, building ubiquitin chains from the UBE2D3-primed NFKBIA-linked ubiquitin, Acts also as an initiator E2, in conjunction with RNF8, for the priming of PCNA, Monoubiquitination of PCNA, and its subsequent polyubiquitination, are essential events in the operation of the DNA damage tolerance (DDT) pathway that is activated after DNA damage caused by UV or chemical agents during S-phase, Associates with the BRCA1/BARD1 E3 ligase complex to perform ubiquitination at DNA damage sites following ionizing radiation leading to DNA repair, Targets DAPK3 for ubiquitination which influences promyelocytic leukemia protein nuclear body (PML-NB) formation in the nucleus, In conjunction with the MDM2 and TOPORS E3 ligases, functions ubiquitination of p53/TP53, Supports NRDP1-mediated ubiquitination and degradation of ERBB3 and of BRUCE which triggers apoptosis, In conjunction with the CBL E3 ligase, targets EGFR for polyubiquitination at the plasma membrane as well as during its internalization and transport on endosomes, In conjunction with the STUB1 E3 quality control E3 ligase, ubiquitinates unfolded proteins to catalyze their

immediate destruction.

Cellular Localization Cell membrane

Post-translational **Modifications**

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