UBC13

Cat. # UB205

Background: Ubc13 is an E2 (ubiquitin conjugating enzyme that is involved in the conjugation of ubiquitin to target substrates along with E1 and E3 enzymes. Ubc13 acts with the UEV protein Mms2 forming a heterodimeric complex that assembles K63-linked polyubiquitin chains utilized in non-degradative ubiquitin signaling pathways (DNA repair, signal transduction). The Ubc13/Mms2 complex is unique in that it has the ability to form free K63-linked polyubiquitin chains in solution in the absence of an E3.

Alternate Names: Ubiquitin-conjugating enzyme E2 13. Homologous to human UBE2N.

Product Information

Purity:	≥ 95% by SDS-PAGE
Molecular Weight:	17kDa
Quantity:	50µg
Physical State:	Liquid
Buffer:	50mM HEPES, ph7.5, 150 mM NaCl, 10% glycerol
Source:	*Saccharomyces cerevisiae*
Tag:	His6
Activity:	Typical enzyme concentration of 100nM-5mM is used for in vitro conjugation, depending on conditions
Storage:	-80^0 C. Avoid repeated freeze/thaw cycles

References

1. Hofmann, R.M. and C.M. Pickart, In vitro assembly and recognition of Lys-63 polyubiquitin chains. *J Biol Chem* **276,** 27936-43 (2001).
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3. VanDemark, A.P., et al., Molecular insights into polyubiquitin chain assembly: crystal structure of the Mms2/Ubc13 heterodimer. *Cell* **105,** 711-20 (2001).
4. Moraes, T.F., et al., Crystal structure of the human ubiquitin conjugating enzyme complex, hMms2-hUbc13. *Nat Struct Biol* **8,** 669-73 (2001).
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