

Ub pSer 65 (human sequence, synthetic)

UbiQ code : UbiQ-089

Batch # : B01042016-001

Amount : 50 ug, lyophilized powder

Purity : $\geq 95\%$ by RP-HPLC and SDS-PAGE

Mol. Weight : 8.65 kDa

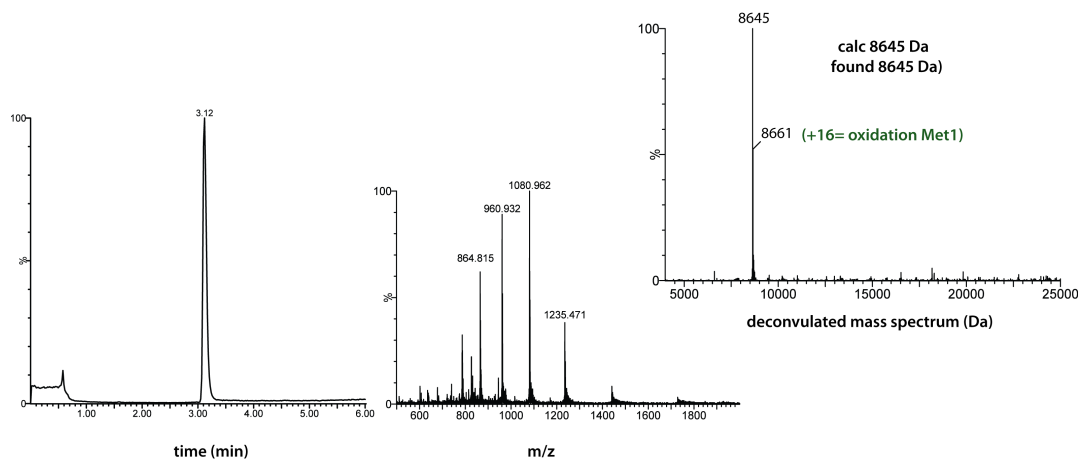
Storage : upon arrival powder at -20°C ; buffered solution at -80°C . Please avoid multiple freeze/thaw cycles.

Productsheet

Background. Ub pSer65 (UbiQ-089) is ubiquitin that is phosphorylated on Ser65, a ubiquitin variant which has been shown to activate Parkin E3 ligase mediated ubiquitination.¹⁻⁹ It has been made by total chemical synthesis¹⁰ and is therefore well-defined in terms of pSer site and incorporation efficiency (100%).

Sequence

MQIFVKTLTGKTITLEVEPSDTIENVKAKIQDKEGIPPDQQLRIFAGKQLEDGRTLSDYNIQKE^SP TLHLVLRLRGG



LC-MS analysis. Mobile phase A = 1% CH_3CN , 0.1% formic acid in water (milliQ) and B = 1% water (milliQ) and 0.1% formic acid in CH_3CN . XBridge BEH300 C18 $5\mu\text{m}$ $4.6 \times 100\text{mm}$; column T = 40°C , flow = 0.8 mL/min. Gradient: 30–95% over 3.5 min.

Important: sample preparation

- dissolve the powder in as little DMSO as possible (e.g. 40 mg/mL)
- add this DMSO stock slowly to milliQ (please note the order of addition)
- buffer the aq. solution as desired (final stocks of e.g. 0.5 mg/mL will contain 1.25 vol% DMSO)
- buffer exchange using 3 kDa spin filters or dialysis membrane allows total removal of DMSO if desired.

UbiQ

targeting the ubiquitin system

Literature.

- 1) Kane *et al. J Cell Biol* **2014**, *205*, 143-153.
- 2) Kazlauskaitė *et al. Biochem J* **2014**, *460*, 127-139.
- 3) Kondapalli *et al. Open Biol* **2012**, *2*, 120080.
- 4) Koyano *et al. Nature* **2014**, *510*, 162-166.
- 5) V. Sauve and K. Gehring *Cell Res* **2014**, *24*, 1025.
- 6) Spratt *et al. Nat Commun* **2013**, *4*, 1983.
- 7) Trempe *et al. Science* **2013**, *340*, 1451.
- 8) T. Wauer and D. Komander *EMBO J* **2013**, *32*, 2099-2112.
- 9) Yamamoto *et al. J Biol Chem* **2005**, *280*, 3390-3399.
- 10) El Oualid *et al. Angew Chem Int Ed* **2010**, *49*, 10149.