



Certificate of Analysis

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Product Name: st-Ht31 Catalog No.: 6286 Batch No.: 1

CAS Number: 188425-80-1

1. PHYSICAL AND CHEMICAL PROPERTIES

Batch Molecular Formula: $C_{129}H_{217}N_{29}O_{39}$

Batch Molecular Weight: 2798.27

White lyophilised solid **Physical Appearance:**

100% **Net Peptide Content:** Counter Ion: TFA

Solubility: Soluble to 1 mg/ml in 0.1% Ammonia

Store at -20°C Storage:

Peptide Sequence: Ste-Asp-Leu-Ile-Glu-Glu-Ala-Ala-Ser-Arg-

Ile-Val-Asp-Ala-Val-Ile-Glu-Gln-Val-Lys-

Ala-Ala-Gly-Ala-Tyr

2. ANALYTICAL DATA

Shows 95.9% purity **HPLC:** Mass Spectrum: Consistent with structure

Europe Middle East Africa



Product Information

Print Date: Jul 7th 2017

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CAS Number: 188425-80-1

Description:

Stearated form of the peptide Ht-31. Inhibits the interaction between the RII subunits of cAMP-dependent PKA and A-kinase anchoring protein (AKAP) in cell extracts. Cell permeable.

Physical and Chemical Properties:

Batch Molecular Formula: $C_{129}H_{217}N_{29}O_{39}$ Batch Molecular Weight: 2798.27

Physical Appearance: White lyophilised solid

Peptide Sequence:

Ste-Asp-Leu-Ile-Glu-Glu-Ala-Ala-Ser-Arg-Ile-Val-Asp-Ala-Val-Ile-Glu-Gln-Val-Lys-Ala-Ala-Gly-Ala-Tyr Storage: Store at -20°C

Solubility & Usage Info:

Soluble to 1 mg/ml in 0.1% Ammonia

This product is supplied as a lyophilized solid and may be very hard to visualize. Solutions should be made by adding solvent directly to the vial. The vial should then be vortexed vigorously to ensure the product has completely dissolved.

Net Peptide Content: 100% (Remaining weight made up of counterions and residual water).

Counter Ion: TFA

Stability and Solubility Advice:

Some solutions can be difficult to obtain and can be encouraged by rapid stirring, sonication or gentle warming (in a 45-60°C water bath).

Peptides in solution are much less stable than in lyophilized form. This is especially true for peptides whose sequences contain amino acids such Cys, Met,Trp, Asn, Gln, and N-terminal Glu.

Therefore we recommend storing peptides in solution for as short a time as possible. Avoid repeated freeze thaw cycles by dividing the peptide solution into aliquots and storing the aliquots at -20°C. Any portion of an aliquot unused after thawing should be discarded.

Peptides stored in solution can occasionally be susceptible to bacterial degradation. We recommend using sterile solutions or passing the peptide solution through a 0.2 µm filter to remove potential bacterial contamination whenever possible.

References:

Gorshkov *et al* (2017) AKAP-mediated feedback control of cAMP gradients in developing hippocampal neurons. Nat.Chem.Biol. *13* 425. PMID: 28192412.

Vijayaraghavan et al (1997) Protein kinase A-anchoring inhibitor peptides arrest mammalian sperm motility. J.Biol.Chem. 272 4747. PMID: 9030527.

Carr et al (1992) Association of the type II cAMP-dependent protein kinase with a human thyroid RII-anchoring protein. Cloning and characterization of the RII-binding domain. J.Biol.Chem. 267 13376. PMID: 1618839.