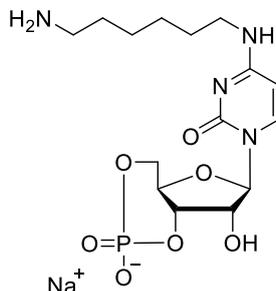


## Technical Information about N<sup>4</sup>-(6-Aminohexyl)-cCMP

Update: July 12, 2018 HU



**Abbreviation:** 4-AH-cCMP

Formula	CAS No.	Molecular Weight	UV	BIOLOG Cat. No.
C <sub>15</sub> H <sub>25</sub> N <sub>4</sub> O <sub>7</sub> P	[pending]	404.4	λ <sub>max</sub> 270 nm / ε 13300 / pH 7	A 143

**Name:** N<sup>4</sup>-(6-Aminohexyl)cytidine-3',5'-cyclic monophosphate

**Description:** 4-AH-cCMP is an analogue of the potential second messenger cyclic CMP (BIOLOG Cat. No. C 001) in which one hydrogen of the amino group in position 4 of the nucleobase is substituted by 6-aminohexane.

**Properties:** 4-AH-cCMP can be used as a ligand for affinity chromatography of cCMP binding proteins and is also suitable for modification with fluorophores and other markers.

**Specification:** Crystallized or lyophilized solid. Please keep in mind that equal concentrations of the compound may look different in volume due to high sensitivity of the lyophilized form to humidity. The compound can even contract to small volume droplets. Normally the product is located in the conical bottom of the tube. Micromolar quantities are determined by UV at λ<sub>max</sub>.

**Purity:** Typical analysis is better than 98% (HPLC / UV / 270 nm). The product is not sterile and has not been tested for endotoxins.

**Solubility:** 4-AH-cCMP is soluble in water (≥ 9 mM). Please rinse tube walls carefully and preferably use ultrasonic or vortex to achieve total and uniform mixing. When opening the tube please make sure that no substance is lost within the cap.

**Stability and Storage:** 4-AH-cCMP is chemically rather stable and does not need special care during handling or shipment. Nevertheless, we recommend that the compound should be stored in the freezer, for longer storage periods preferably in freeze-dried form.

**Toxicity and Safety:** Since cCMP could have multiple tasks in every organism, it is not unlikely that its analogues could interfere with many cell regulation processes *in vivo*. However, due to the rather small quantities to work with, no health hazards have been reported. Nevertheless please keep in mind, that the *in vivo* properties of this compound are not sufficiently characterized up to now. Avoid skin contact or ingestion and allow only trained personnel to handle the product.

Our products are designed, developed and sold for research purposes only! They are intended for *in vitro* and nonhuman *in vivo* laboratory applications. Any other use requires approval of health authorities.

**Not for drug, household or related uses!**

### Selected Reference for 4-AH-cCMP:

Hammerschmidt, A.; Chatterji, B.; Zeiser, J.; Schröder, A.; Genieser, H.-G.; Pich, A.; Kaefer, V.; Schwede, F.; Wolter, S.; Seifert, R., *PLoS ONE*, 7, 39848 (2012): "Binding of Regulatory Subunits of cyclic AMP-dependent Protein Kinase to cyclic CMP Agarose"