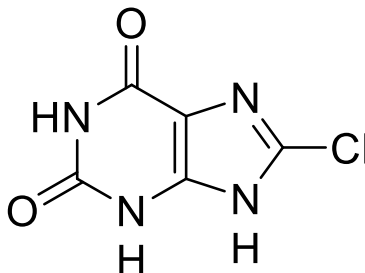


Technical Information about 8-Chloroxanthine

Update: September 10, 2018 HU



Abbreviation: 8-Cl-X

Formula	CAS No.	Molecular Weight	UV	BIOLOG Cat. No.
C ₅ H ₃ ClN ₄ O ₂	[13548-68-0]	186.6	λ _{max} 276 nm / ε 12500 / pH 7	C 044

Name: 8- Chloroxanthine

Description: 8-Cl-X is an analogue of the purine base xanthine in which the hydrogen in position 8 is replaced by a chlorine atom.

Properties: 8-Cl-X is a potential metabolite of 8-chloro-cAMP (8-Cl-cAMP, Cat. No. C 007), 8-chloroadenosine (8-Cl-Ado, Cat. No. C 006) and other 8-chloroadenine containing structures.

Specification: Crystallized or lyophilized solid. Please keep in mind that equal concentrations of the compound may look different in volume due to 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_{max}.

Purity: Typical analysis is better than 95% (HPLC / UV / 276 nm). The product is not sterile and has not been tested for endotoxins.

Solubility: 8-Cl-X has good solubility in DMSO or DMF and is also moderately soluble in water. However, limits have not been determined. 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: 8-Cl-X has sufficient stability for short term exposure to ambient temperature 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: 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 References for 8-Cl-X:

Cummings, J.; Fielding, H.; Miller, W.R., *J. Pharm. Biomed. Anal.*, **12**, 1289 - 1294 (1994): "Pharmaceutical Analysis of 8-Chloroadenosine 3',5'-monophosphate"

Han, Z.; Chatterjee, D.; Wyche, J.H., *J. Pharmacol. Exp. Ther.*, **265**, 790 - 794 (1993): "Proliferation of Nontransformed Cells is Inhibited by Adenosine Metabolite of but not by Parental 8-Cl-cyclic AMP"

