



# Methoxy e-Coelenterazine

Me-O-e-CTZ emits around 405 nm with RLuc, RLucII, RLuc3, RLuc8 and Green Renilla Luc

## **Product Description**

Name: Methoxy e-Coelenterazine

Catalog Number: FP-1J4380, 250 µg

FP-1J4381, 500 μg

FP-1J4382, 1mg FP-1J4383, 10mg

**Molecular Weight:** MW= 463.53

**Solubility:** Coeletnerazine Solvent

**Emission:**  $\lambda_{em} = 405 \text{ nm}$ 

OH N N N H

Storage: It is best stored as completely DRY powder under argon in air-tight O-ring plastic tubes at -20°C or for longer storage at -70°C, protected from light

#### Introduction

methoxy e-Coelenterazine (Me-O-e-CTZ) is a new synthetic analogue of e-Coelenterazine with an additional methoxy group quenching the emission maximum from 475 nm to 405 nm (Patented Technology developed Prolume Purple - US Patent 2013/057660).

methoxy e-Coelenterazine (Me-O-e-CTZ) exhibits an up to 13-fold higher luminescence than CTZ400a ("deep blue C").

The luciferin is shipped as filtered, lyophilized, batch controlled substrate in 250  $\mu$ g and 500  $\mu$ g aliquots. 1 mg = 2 x 500  $\mu$ g. 10 mgs is packed as regular powder in one tube.

The advantages of lyophilized luciferins are:

- pre-aliquoted in small amounts, fresh substrate for every set of experiments
- long shelf-life (packed under Argon)



### **Directions for use**

#### **Content**

231.8  $\mu$ g water soluble Me-O-e-CTZ (MW: 463.53) per vial, resulting in a 50  $\mu$ M Me-O-e-CTZ solution if dissolved in 10 ml of an aqueous buffer.

#### **Storage**

It is best stored as completely DRY powder under argon in air-tight O-ring plastic tubes at -20°C or for longer storage at -70°C, protected from light

#### Usage

It is always best to make FRESH SOLUTIONS immediately before luminometer assays or experiments.

- 1. Dissolve lyophilized Me-O-e-CTZ in Coelenterazine Solvent as a 1 mg/ml solution (Ethanol won't dissolve Me-O-eCTZ).
- 2. Use this stock solution to make an aqueous solution in PBS or TBS (e.g. 50  $\mu$ M for luminometer assays equal to 231.8  $\mu$ l (1mg/ml) in 10 ml PBS).
- 3. Store dissolved Me-O-e-CTZ at -80°C, do not store the aqueous working solution (it will oxidize over time). Me-O-e-CTZ has the same stability in aqueous solutions like any other Coelenterazine analogue.

Please note that the stability of the compound is dependent on the pH of the added buffer. Buffers with a pH greater than 6.5 will cause a faster degradation (oxidation) of the Coelenterazine compound.

#### References

- Zhang *et al.* Bioluminescence Assisted Switching and Fluorescence Imaging (BASFI), *J.Phys. Chem. Lett.*, 4:3897-3902 (2013)

#### **Technical and scientific information**

#### Related products

- Coelenterazine Solvent, 1J4660
- rLuc plasmids from Oxford Genetics
- Viromer RED for plasmid transfection, 1G7630

## Ordering information

Catalog size quantities and prices may be found at <a href="http://www.interchim.com">http://www.interchim.com</a>. Please inquire for higher quantities (availability, shipment conditions).

For any information, please ask : FluoProbes  $^{\text{\tiny{\$}}}$  / Interchim; Hotline : +33(0)4 70 03 73 06

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