

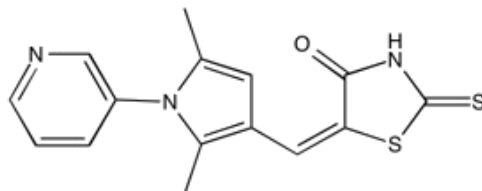
**Catalog # 10-1456**

**Optovin**

CAS# 348575-88-2

5-[[2,5-Dimethyl-1-(3-pyridinyl)-1H-pyrrol-3-yl]methylene]-2-thioxo-4-thiazolidinone

Lot # X106456



Reversible, photoactive TRPA1 activator. Optovin stimulates human TRPA1 channels and enables repeated photoactivation of motor behaviors in wild-type zebrafish ( $EC_{50} = 2 \mu\text{M}$ ) and mice, *in vivo*. Photodetection is performed by sensory neurons expressing the TRPA1 cation channel which is activated via structure-dependent photochemical reactions with redox-sensitive cysteine residues.<sup>1</sup>

- 1) Kokel *et al.* (2013), *Photochemical activation of TRPA1 channels in neurons and animals*; Nat. Chem. Biol., **9** 257

**PHYSICAL DATA**

Molecular Weight:	315.41
Molecular Formula:	C <sub>15</sub> H <sub>13</sub> N <sub>3</sub> OS <sub>2</sub>
Purity:	98% by TLC
	NMR: (Conforms)
Solubility:	DMSO (up to 30 mg/ml).
Physical Description:	Tan solid
Storage and Stability:	Store as supplied, desiccated at -20°C for up to 1 year from the date of purchase. Solutions in DMSO may be stored at -20°C for up to 2 months.

**Materials provided by Focus Biomolecules are for laboratory research use only and are not intended for human or veterinary applications.**

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