

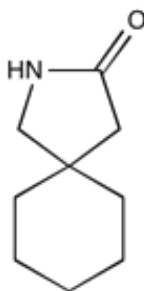
**Catalog # 10-2535**

**Gabapentin lactam**

CAS# 64744-50-9

4,4-Pentamethylene-2-pyrrolidone; GBP-L

Lot # X101430



Reduces protein aggregates and improves motor performance in a transgenic mouse model of Huntington's disease.<sup>1</sup> Displays neurotrophic effects, enhancing the formation of dendritic filopodia and inducing a network of F-actin-containing neurites in cultured hippocampal neurons.<sup>2</sup> Promotes the survival of cultured central nervous system neurons possibly by opening mitochondrial K<sub>ATP</sub> channels.<sup>3</sup> Displays neuroprotective effects in a rat model of acute retinal ischemia.<sup>4</sup>

- 1) Zucker *et al.* (2004), *Gabapentin-lactam, but not gabapentin, reduces protein aggregates and improves motor performance in transgenic mouse model of huntington's disease*; *Nauyn Schmiedebergs Arch. Pharmacol.*, **370** 131
- 2) Henle *et al.* (2006), *Gabapentin-lactam induces dendritic filopodia and motility in cultured hippocampal neurons*; *J. Pharmacol. Exp. Ther.*, **319** 181
- 3) Pielen *et al.* (2004), *Retinal ganglion cell survival is enhanced by gabapentin-lactam in vitro: evidence for involvement of mitochondrial KATP channels*; *Graefes Arch. Clin. Exp. Ophthalmol.*, **242** 240
- 4) Lagreze *et al.* (2001), *The neuroprotective properties of gabapentin-lactam*; *Graefes Arch. Clin. Exp. Ophthalmol.*, **239** 845

**PHYSICAL DATA**

Molecular Weight:	153.22
Molecular Formula:	C <sub>9</sub> H <sub>15</sub> NO
Purity:	98% by TLC
	NMR: (Conforms)
Solubility:	DMSO (up to 40 mg/ml)
Physical Description:	White solid
Storage and Stability:	Store as supplied desiccated at room temperature 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.**