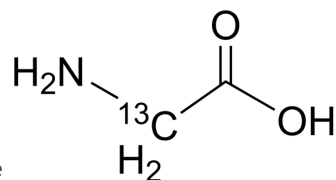


## Glycine-2-<sup>13</sup>C

<b>Cat. No.:</b>	HY-Y0966S2		
<b>CAS No.:</b>	20220-62-6		
<b>Molecular Formula:</b>	C <sup>13</sup> CH <sub>5</sub> NO <sub>2</sub>		
<b>Molecular Weight:</b>	76.06		
<b>Target:</b>	iGluR; Endogenous Metabolite		
<b>Pathway:</b>	Membrane Transporter/Ion Channel; Neuronal Signaling; Metabolic Enzyme/Protease		
<b>Storage:</b>	Powder	-20°C	3 years
		4°C	2 years
	In solvent	-80°C	6 months
		-20°C	1 month



### SOLVENT & SOLUBILITY

#### In Vitro

H<sub>2</sub>O : 100 mg/mL (1314.75 mM; Need ultrasonic)

Concentration	Mass		
	1 mg	5 mg	10 mg
1 mM	13.1475 mL	65.7376 mL	131.4752 mL
5 mM	2.6295 mL	13.1475 mL	26.2950 mL
10 mM	1.3148 mL	6.5738 mL	13.1475 mL

Please refer to the solubility information to select the appropriate solvent.

### BIOLOGICAL ACTIVITY

#### Description

Glycine-2-<sup>13</sup>C is the <sup>13</sup>C-labeled Glycine. Glycine is an inhibitory neurotransmitter in the CNS and also acts as a co-agonist along with glutamate, facilitating an excitatory potential at the glutamergic N-methyl-D-aspartic acid (NMDA) receptors.

#### IC<sub>50</sub> & Target

NMDA Receptor

#### In Vitro

Stable heavy isotopes of hydrogen, carbon, and other elements have been incorporated into drug molecules, largely as tracers for quantitation during the drug development process. Deuteration has gained attention because of its potential to affect the pharmacokinetic and metabolic profiles of drugs<sup>[1]</sup>.

MCE has not independently confirmed the accuracy of these methods. They are for reference only.

### REFERENCES

[1]. Russak EM, et al. Impact of Deuterium Substitution on the Pharmacokinetics of Pharmaceuticals. *Ann Pharmacother.* 2019;53(2):211-216.

---

**Caution: Product has not been fully validated for medical applications. For research use only.**

Tel: 609-228-6898

Fax: 609-228-5909

E-mail: [tech@MedChemExpress.com](mailto:tech@MedChemExpress.com)

Address: 1 Deer Park Dr, Suite Q, Monmouth Junction, NJ 08852, USA